Massey's Illustrated

UNITED WITH THE "TRIP HAMMER."

(PUBLISHED MONTHLY.)

May Number

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WILD WHITE CATTLE OF CHILLINGHAM. (*From a Painting by Landseer.*) (*See page* 4.)

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THE TORONTO MOWER No. 2.

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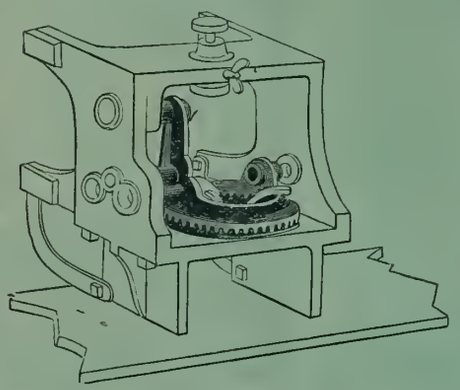

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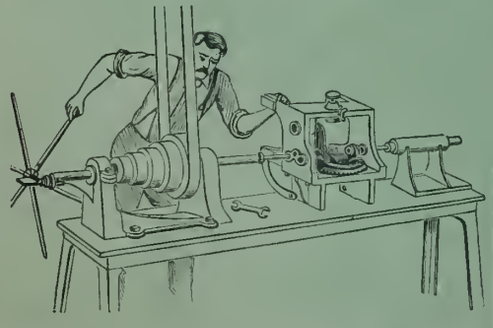
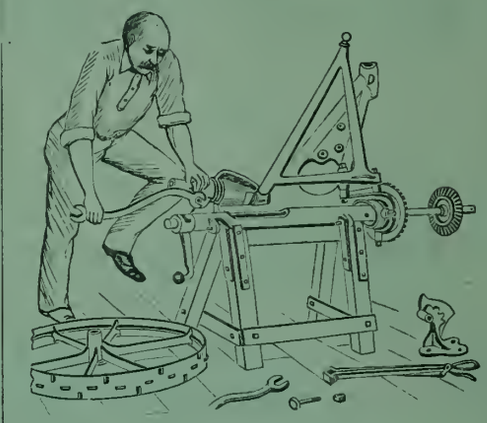


The "Gig" in Use on a Boring Machine.

HOW WE MAKE THEM.



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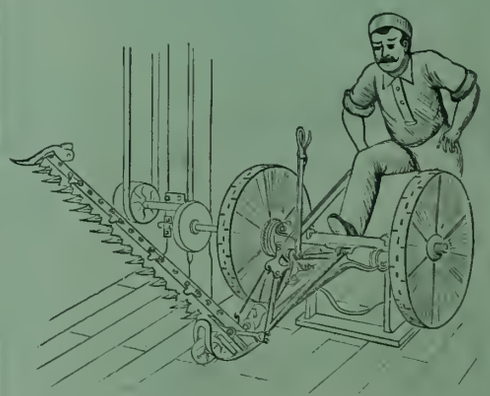

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A JOURNAL OF NEWS & LITERATURE FOR RURAL HOMES

UNITED WITH THE "TRIP HAMMER."

New Series. Published Monthly. | TORONTO, CANADA, MAY, 1889 | [Vol. I., No. 6.

ROUND THE WORLD,

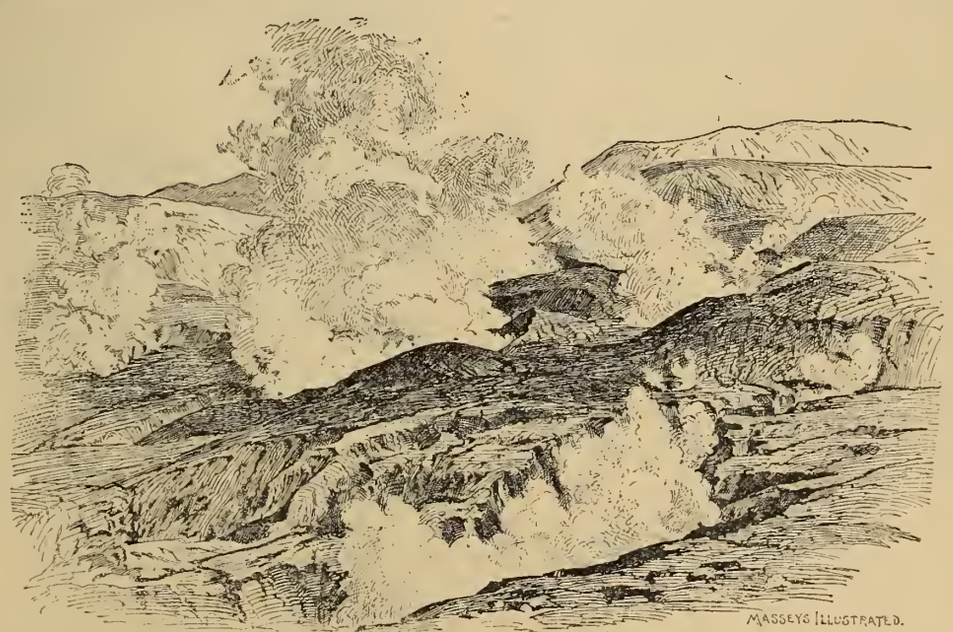
A Run through the OCCIDENT, the ANTIPODES, and the ORIENT.

(Extracts from a series of letters written to the employés of the Massey Manufacturing Co., by W. E. H. Massey, Esq.)

NEW ZEALAND.

Fourth Letter, dated Hobart, Tasmania, Jan. 19th, 1888.—Concluded.

On our way back we turned aside to visit Whakarewarewa—the "geyser garden," owned by and in charge of the native settlement about it—about three miles from Ohinemutu. In Whakarewarewa alone there are so many natural and most interesting wonders, that could it be transported to a remote part of Ontario, thousands of eager tourists would flock to see them. There are great varieties of sulphur and mineral springs and geysers, and some hot and boiling pools which make excellent baths—having special curative powers for rheumatism and skin diseases. There are several large spouting geysers which "go off" at frequent intervals, the largest, so it is said, at times throwing a stream 60 feet high, though when I saw it 20 to 30 would be the limit. Time will not permit my expatiating upon the beauty of these spouting geysers,



THE SITE OF THE PINK AND WHITE TERRACES AS THEY ARE NOW AND AS SEEN BY MR. W. E. H. MASSEY (FROM A PHOTOGRAPH IN HIS POSSESSION)

THE PINK TERRACE, SEEN FROM BELOW, AS IT APPEARED BEFORE THE ERUPTION AT ROTOMAHANA.

though they are worthy of special mention. About them there was much sulphur deposit and beautiful silica formation. Strange gurgling steaming sounds were to be heard on every hand, and heated vapors were escaping from all sorts of crevices and holes. One of the prettiest features of the place were some lovely large and natural basins — very deep and lined with white silica formation — containing water of a beautiful green hue. It is a strange and curious fact that the water in one of these basins lowers some eighteen to twenty-four inches during the eruption of the largest geyser, and immediately fills again during the interval of rest. But I must leave off speaking of Whakarewarewa and our experiences on the thirty-three mile excursion of that day, if I am to tell you anything of our trip to the great and terrible wonder of this region of wonders —I refer to the scene of the awful disaster at Rotomahana in June, 1886.

Having a very hard and fatiguing journey of forty-two miles ahead of us, we made an early start next morning, the first nine miles being performed on horseback. The road skirts the shore of Rotorua for three miles, then turns away from the lake up over the hills, the bridle-path being very good at the first, but for the last five miles shockingly bad—at home at least it would be con-

sidered an unfit place for man or beast to travel. There was once a good carriage road from Rotorua to Wairoa—a village near the shore of Lake Tarawera, some ten miles from the scene of eruption—the drive winding in and out through the hills, along the steep sides, and through the bush; but it has been so completely destroyed in the manner referred to above as to leave no trace of its former existence in the best part of the last eight miles. So our bridle-path, if such it can be called, led through some exceedingly bad places—up and down deep gulleys—over wash-outs and stones—and when we reached the bush, over roots and broken trees—through narrow places and under fallen limbs, to pass through which safely, it at times became necessary to almost lie flat on one's horse. I speak of this, to convey to you something of an idea of the destruction wrought by the eruption. The bush referred to, known as the Tikitapu Bush, is said to have been one of the finest in New Zealand, and enough magnificent forest giants and luxuriant undergrowth of ferns and shrubbery is left in a semi-destroyed state on the end farthest from the volcano, to lead oue to imagine what it once was; but as one nears the scene of disaster, it gets worse and worse—immense trees having been smashed like match wood and the undergrowth completely buried by the furious stream of mud and ashes. But terrible as must have been the crashing of these timbers, some persons living on the edge of this bush who narrowly escaped at the time of the mud storm, say they never heard the snapping and falling of the forest trees, so all-absorbing was the roar of the volcano.

Emerging from the bush we came to Lake Tikitapu—once of a beautiful blue color, but now only a muddy pond about a mile or so across. Our path followed its shore for a little distance—it being necessary to wade part of it close to the shore, the hillside, where previously the road was, being quite impassable—and there left our horses and proceeded on foot, it being impossible for beasts to travel farther.

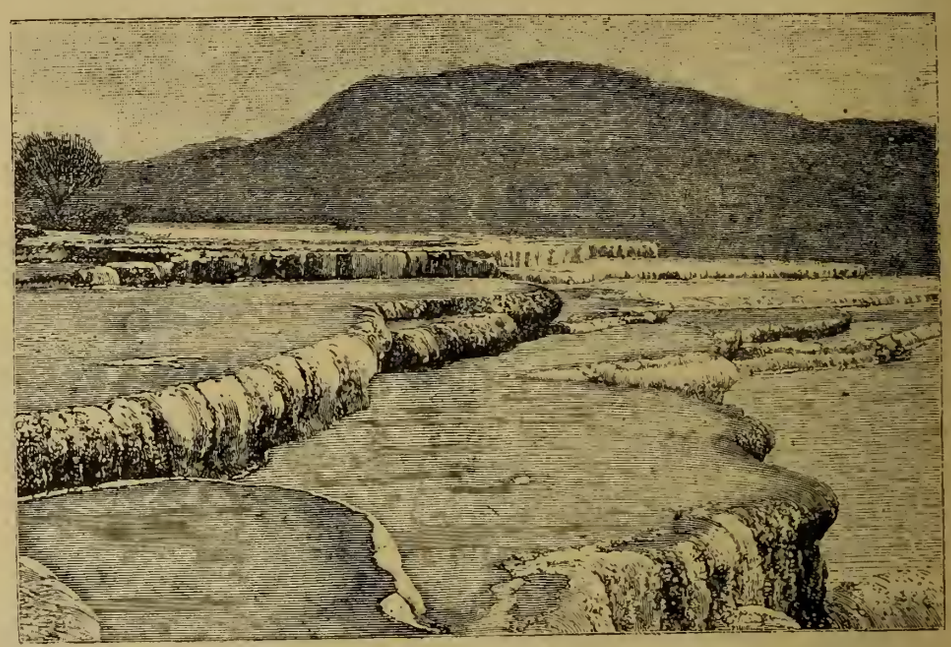
This walk, as may be imagined, was a decidedly rough one, up and down through deep cuts and

THE VILLAGE OF WAIROA BEFORE THE ERUPTION—TEN MILES FROM THE VOLCANO.

crevices and over heaps of baked mud and ashes, past Lake Rotokakahi, and following the course of its outlet to Wairoa. Lake Rotokakahi, formerly a green lake, but now also changed to a muddy color, is ninety-five feet lower than Lake Tikitapu, though only separated from it by a very narrow ridge. The water in both of the lakes rose nearly three feet as a result of the eruption. The semi-buried village of Wairoa presents a most desolate scene; it would be hard to conceive a more terrible picture of wreck and disaster. Here and there are native huts buried almost to their eaves in mud and ashes—"the old mill," its great water wheel half covered with the deposit—the small frame hotels with their roofs caved in and the side walls bulged and cracked in a frightful manner—and other buildings or huts wrecked and all but totally covered—are sad and too plain evidence of the powerful forces at work that awful night. The majority of the people iu this little village miraculously escaped by assembling in the *runaga*, or native meeting house, and native *whare*, keeping up the roofs with numerous props. Five Europeans and six natives, however, were lost. Though in times past a luxuriant vegetation clothed the hillsides about Wairoa, at present but the slightest vestiges remain, even these disappearing entirely as one approaches Tarawera.

It would go beyond the powers of our imagination to picture to ourselves the sceue of that night of horror, for even eye-witnesses, several of whom I carefully questioned, cannot give a clear account of the phenomena. The gist of it is as follows:—On the evening of June 9th, 1886, a beautiful "electric cloud" hung over Mount Tarawera, illuminated by flashes of lightning resembling "barbed wire." Thinking it a "pretty thing" and not heeding it as a warniug, the neighboring villagers watched it until satisfied and retired, but only to be awakened next morning at half past two by a "most awful noise" and "quaking of the earth," following which came a "storm of mud" and a shower of "hot ashes and fire," and "fire balls" or "volcanic bombs," which kept up for several hours, and with all a "gale of wind" and "fearful lightnings" (I picked up two specimens of these "volcanic bombs" in front of the hotel at Wairoa, ten miles from the volcano). Flames and fire shot up from Tarawera miles into the air, which people in Auckland, 168 miles away, claimed to have seen, while ships, many, many miles away at sea, had their decks covered with volcanic dust.

Oh, what a fearful night it must have been for the people of that district! What mental suffering! What awful auxiety! A young tourist who was killed at Wairoa, had commenced what evidently he knew would be a farewell letter:—"This is the most awful moment of my life. I cannot tell when I may be called upon to meet my God. I am thankful that I find His strength sufficient for me. We are under heavy falls of volcano ——" but these words were all he had time to write, for, when making necessary escape from the tottering hotel, a portion of the building fell upon him, killing him instantly, this unfinished note being found in his hand. But I must hasten on with my narrative.

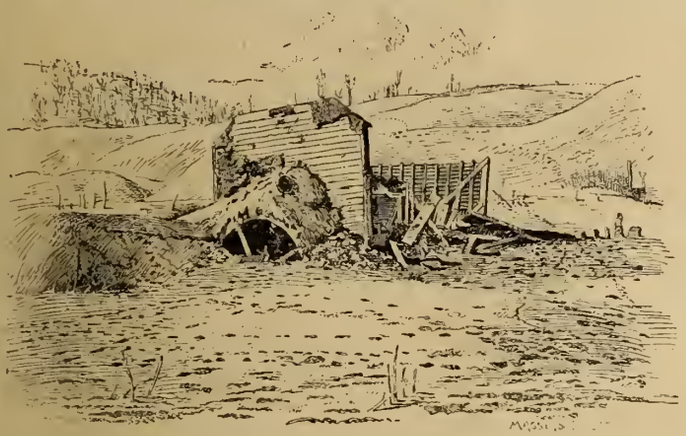


THE WHITE TERRACES, SEEN FROM ABOVE, AS THEY APPEARED PRIOR TO THE AWFUL ERUPTION AT ROTOMAHANA.

From Wairoa our path descended a somewhat dangerous and very steep and rough decline to the shore of Lake Tarawera—a very irregularly shaped lake of some fourteen miles in extent, which is said to have risen twelve feet during the morning of June 10th. Here we embarked in a row boat, our guide and two stalwart natives, who had come with us for the purpose, pulling us the nine miles to our point of landing. These two natives were of a tribe not belonging in the district, for nothing would induce a resident native to come near the place, it being considered by them *tabu* or sacred. There was not a cloud in the sky aud the blazing sun was shining down upon us with its noonday heat, the barren mud-covered hills about us without the slightest vegetation to relieve the eye, but adding to its intenseness.

As Tarawera first comes into view across the lake it appears as a mountain of immense proportions with triple craters. Upon rounding the first poiut on our right the guide pointed out to us the location of a native village on the shore, of

which now not the slightest signs are visible, as it is completely buried with its thirty-nine inhabitants some forty feet below—not as much as a single soul having escaped to tell of their awful fate. At the place of our landing, several miles farther on, was formerly another well-kept native village of fifty-nine souls, which is buried to even a greater depth. These last were the natives who used to own, and who had charge of, the famous large Pink and White Silica Terraces—elegant specimens of nature's most



A PORTION OF THE VILLAGE OF WAIROA AFTER THE ERUPTION OF MOUNT TARAWERA—THE OLD MILL. (FROM A PHOTOGRAPH IN MR. W. E. H. MASSEY'S POSSESSION.)

delicate and beautiful workmanship and the pride of all New Zealanders—located beside Lake Rotomahana, a little over a mile back of the village; here, too, tourists, who came from all parts of the world to see these wonderful terraces, used to land.

Ah, what a change! there was not the slightest indication that human being ever had or ever could have existed there. Before and on every hand, as far as the eye could reach, there was naught but most barren hills covered with baked mud and ashes. A territory many, many miles in extent of fearful desert waste.

As we plodded our way up to Rotomahana over the hills, through gulleys and over numerous fissures and crevices, all was desolation, and the scorching sun added none to the attractiveness of the scene.

There was nothing to rest the eye from this awful barrenness, and strange thoughts came over us in that desert place as we were reminded that we were twelve miles from other human souls. We tramped up to the edge of what formerly was the basin of Lake Rotomahana, once a lovely little lake surrounded with vegetation, while close to it were the Terraces before mentioned; but now there is nothing beautiful or desirable left—not even a weed to be seen anywhere. The whole aspect of the country round about has been most completely and effectually changed. The lake itself was blown up entirely, and the greatly prized and admired Pink Terrace probably went up in atoms, while the White Terrace is a hundred feet under mud, if it exists at all—and all this terrible, terrible wreck in a few hours of a single night!! A great rent or rift, commencing at the volcano, extends for miles across the country, running through the basin of Rotomahana, which is not far from Tarawera. It is the theory of scientists that the "rift" was first made, letting the water from the lake into the fires beneath, which being immediately converted into steam, caused the dreadful explosion at Rotomahana, whence came the mud, while the hot ashes and fire balls came from Mount Tarawera, which increased in height 160 odd feet, so it is said.

As we looked down into the nearly empty basin of Rotomahana, steam holes and hot springs were sending up vapor in scores of places below, and considerable water had again accumulated in the bottom. We also looked into the nearest crater—a deep, fearful-looking hollow, with very little activity now, nothing save steam and vapor coming from hot springs and crevices below.

In the hillsides all about the place are crevices, many of them very large and fully 100 feet deep—everything told plainly of some terrific upheaval or convulsion of nature. We were not sorry to leave this sterile region, but it was the opportunity of a lifetime to see it and one which we were glad of the chance of improving. Our weary return to Ohinemutu was pursued by the same route and manner in which we came, and bedtime was gladly welcomed that night, for we had accomplished a hard day's journey.

* * * *

Extract from Fifth Letter by Mr. W. E. H. Massey.

Before leaving Ohinemutu we made the excursion to the pretty island of Mokoia, so dear to the natives, because of its historic associations and the legendary lore in connection with it.

The island is nearly round—is really a hill about a mile across located in the middle of Lake Rotorua. Amongst the bush we found a rusty gun barrel and some human bones, relics of a battle of over sixty years ago. An old Maori chief and part of his tribe live on the island and there raise the maize and potatoes upon which they subsist. The old chief came ont of his grass hut and invited us in to have tea with him, but his countenance was not so benign nor his *whare* so cleanly as to induce us to accept, hence we respectfully declined.

The long, rough, and tiresome coach-ride of fifty-six miles from Rotorua to Taupo was through a barren, hilly country which afforded little interest, and we were right glad when the day's journey was completed. The only spot worth mentioning was at Ateamuri, where we crossed the Waikato river. Here there was an enormous isolated rock of great height, with almost perpendicular sides, thrown up by some strange convulsion of nature, around the base of which the pretty stream flowed in a graceful manner. Just before reaching Taupo we had a long, steep climb of 2,200 feet.

Tapuwaeharuru (Taupo for short), which is a very small settlement, and now merely a coach station, is beside the Waikato river, just where it leaves Lake Taupo—the largest lake in New Zealand, being over twenty-five miles across. This lake is 1,175 feet above sea level, and is in almost the exact centre of the North Island. Taupo is a convenient stopping place for tourists desiring to see the sights of the neighborhood. Formerly it was a constabulary station for watching the natives, which would correspond to our North-West mounted police stations for keeping peace amongst the Indians. Here we spent several days in rest and sight seeing. The beach of the lake is composed almost entirely of pumice stone, which abounds in the vicinity.

Across the lake from Tapuwaeharuru, distant thirty-six miles, is the large volcano, Tongariro (6,500 feet), still slightly active. From its crater steam may be seen ascending in a cloud on a clear day. One eve at sunset the effect was very pretty. Twenty-four miles farther on in the same direction is Mount Ruapehu (9,000 feet), a third of its height being buried in snow. Wairakie, another wonderful garden of marvellous hot springs, geysers, and fumaroles, is a ride of six miles from Taupo. "Glen Lofley," only three miles, is still another centre of springs of excellent curative properties—indeed there are hot and cold mineral springs all about the place. The charming Waikato river, which empties Lake Taupo, flows from it with a very swift current and has cut for itself a very deep channel. The river, too, is very deep and of a beautiful green color. The banks, or rather the walls which define its course, are bold and rocky in places and again covered with fern, and a more lovely stream it would be difficult to imagine.

A row of a few miles down this stream I enjoyed immensely. Being a very crooked river, the frequent and sometimes sharp bends added much to the charm of the scenery. The hot springs and mud holes along its banks, some of which are not only difficult but very dangerous to explore, were, however, the leading sources of interest. Chief of the numberless springs is the Crow's Nest Geyser, which throws a large, hot stream to an immense height, but at very irregular intervals.

(To be continued.)

THE volcanic region of the North Island (New Zealand) is a large one. On an area of one hundred and fifty square miles there are many thousands of hot springs of all temperatures from tepid to boiling, and of all sorts of composition. * * One spring has been so successful in curing skin diseases that it is known as the "pain-killer;" its ingredients are sulphate of potash, sulphate of soda, chlorides of sodium, calcium, magnesia, and iron, silica, hydrochloric acid, sulphuretted hydrogen, and traces of alumina, lithium, and iodine. What disease could stand such a combination as that?—THOS. W. KNOX, *in the Boy Travellers in Australasia.*

THE BEAUTIFUL PUMICE BEACH OF LAKE TAUPO, N.Z. (FROM A PHOTOGRAPH TAKEN BY MR. W. E. H. MASSEY.)

The Wild Cattle of England.

(*See front page of cover.*)

SOMETIMES a foolish rhyme will stay by one's memory when things of importance can get no lodgment there; and how a little incident out of history, a picturesque passage, even a name that sounds romantic, will cleave to one!

Long time ago, in idly turning over the leaves of a book, my eye was caught by a bit about some cows—a herd of white cows with red ears. These white cows passed across a page of English history, and vanished, but the picture remained with me as distinct as if it had been photographed. To me it was a wonderful thing never to be forgotten. I have been on the lookout for those beautiful cattle ever since, and every now and then, along the years, have had a glimpse of their kind, on some page of romance or poetry or record of travel.

They are historic cattle; and the subject to one who loves animals is a delightful one. There are actually in England at the present time, preserved in the parks of some of the nobility, a few herds of the same breed that roamed the island in aboriginal times; a perfectly distinct stock from all others so far as can be ascertained, retaining the race marks, being invariably white or cream-white, and having certain distinguishing colors about the muzzle and ears, either in red, brown or black—of which more hereafter.

One of the best accounts is to be found in a recent illustrated work called *Extinct British Animals*, where minute descriptions and a list of herds are given. We are told that the best authorities claim that they are direct descendants of the native cattle of Britain, and it is their kind meant by the *Ursus* (*Bos primigenias*) of Cæsar; and as "the *Ursus* belonged with prehistoric times, coeval with man of the elder Stone age" (remains having been found in the fens and elsewhere), the evidence is that they are of very remote origin.

One likes to think of them—the same kind of white cattle there since the very beginnings of England, through all the changes that have taken place; that though

"Men may come, and men may go,"

and though men have come and gone, Britons, Romans, Picts, Scots, Danes, Saxons, Normans, have intermingled, or have died out, or lost their identity, these have remained not materially changed. There is a trifle of sentiment about it, a poetic and romantic side; but then, one must love cattle to feel it, and to like to think of those foregoers, those wild, untamable, beautiful creatures that belonged there even before the earliest kings.

There is the head of an ox on the obverse side of a coin of Cunobelin—and who was Cunobelin but the Cymbeline of Shakespeare, who kept his court at Silchester, the capital of Hants, now Hampshire? The cattle were familiar to the Roman invaders, the Roman legions, the Roman builders of the great roads. Over what long, long stretches of time they were to be encountered! King Alfred must have had to shun them in his wanderings, for they were almost as dangerous as the wild boars and wolves; they were hunted by Robert Bruce, known to Robin Hood and his merry men!

They ranged what is now Great Britain, from the wilderness where London is to the fens of Lincolnshire; from Northumberland on the Border through the vast Caledonian Forest even to "Far Lochaber;" and were all through the wild places of wild Wales. They are mentioned in the forest laws of Canute and other sovereigns; and in Wales, away back nine centuries or more ago, "white cattle with red ears" were paid as a penalty for certain offences. How explicit the wording, as if the fair color and the ear-marks made them distinguished and valuable! A woful tale is to be found in the history of King John of England, how, out of revenge, he had William de Braouse and his children put in prison and there starved to death, and how the distressed Lady de Braouse, hoping to propitiate the tyrant before it was too late, sent to his queen at Winchester a present of four hundred cows and a bull "all milk white with red ears."

In the ancient metrical romances the wild cattle appear. King Arthur (to put the words in modern English),

"He made a feast, the sooth to say,
Upon the Whitsunday,
At Cardiff that is in Wales,
And after meat there in the halls,"

Sir Colgrewance recounted to the Knights of the Round Table a tale of adventure in the forest, where were wild beasts and cattle and a man who could charm them around him, as St. Francis of Assisi could have done, or perhaps the Pied Piper of Hamelin.

Not such, however, the case of Guy, Earl of Warwick, in the Saxon legend of King Athelstane's time. There was no charming then, but, according to the verses, a most dire fight with a "dun cow" on Dunsmore Heath—"dun" is a word of frequent occurrence in such description in the old ballads, and is as likely to mean a tawny white as anything else. As to the ferocity of these cattle, Sir Walter Scott speaks of it in not less than three of his novels, besides in the spirited ballad of "Cadyow Castle." In *Kenilworth*, at the close of Chapter XVII., he makes Wayland compare himself to the "Scottish wild cattle," and in the note, as in several other places, refers to those kept at Chillingham. In *The Bride of Lammermoor*, Chapter V., it was one of them that put Lucy Ashton in the deadly peril from which the Master of Ravenswood rescued her; an animal of "a dingy white, or rather a pale yellow, with black horns and hoofs." In *Castle Dangerous* many pages are devoted to a hunt of wild cattle; the savage country is described and the animals of the chase; a meet was appointed in the morning outside the barricade of Douglas Castle for a solemn hunting match, and in the afternoon the "recheat" was sounded to summon the huntsmen together beneath a big oak in Douglas Dale, where a great out-of-door feast was eaten Robin Hood-like. Sir John de Walton was the only one who had killed one of the formidable Caledonian cattle, though of other game there was no lack.

It is to be noticed that Sir Walter and many writers sometimes use the word "park" and at others "chase." Both represent tracts of land, which, according to Blackstone, the sovereign granted to the nobles, while he reserved the forests in general for his own diversion. A chase was not inclosed; a park was an inclosed chase. Is not the latter a captivating and meaning-ful word? There is a witchery in certain words, in the very sound of them; they are whole poems and stories to us—they suggest so much, and set our imagination wandering. I appeal to the romance in you if it is not so! Think of Chevy Chase and the famous hallad; of "The Talking Oak" of Tennyson with the tilt of its rhyme!—

"Once more the gate behind me falls,
Once more before my face,
I see the mouldered Abbey-walls
That stand within the chase."

And the apostrophe to the oaks—just such oaks as there are here and there over England:

"O, hide thy knotted knees in fern,
And overlook the chase."

As the population increased, the wild cattle were routed from their native haunts, just as deer and buffalo were in the far West of our own country, but they were saved from extermination in the parks that the great nobles were permitted to inclose, and that is "the clue to the history" of the preservation of herds of so many years; at least sixteen were known which have now become extinct, though several, as will be shown, still remain. In two of the cases they became so savage or troublesome that they had to be killed; in one, they all died out from sickness.

Different marks distinguished some from the Chillingham cattle, which are considered purest. In a few instances they had no horns. At one place they were pure white except the muzzle and inside of the ears which were black; at another, the tips of the tails were likewise black; at another, the hoofs. One herd was white with black ears; another had black muzzles, black ears, and a fine black circle around the eyes. But whatever the variations, all must have been beautiful animals. What pictures they must have helped to make in those magnificent forests of old England, as they stood knee-deep in the fern under the giant oaks and beeches, or were seen among the lush grasses of the fens, or on the purple moors, or far down the vistas of wildwood places, in spaces of light or spaces of shade on the greensward, in such a scene as that where *Ivanhoe* opens or such as we come upon in English story, and which English ballads are full of!

There are bits of genealogy and little incidents that might be given about some of these parks and estates; thus, Barnard Castle in Durham, where there was once a herd, was in the royal chase of Marwood, and belonged successively to the Baliols, Beauchamps and Nevilles, earls of Warwick, but became by marriage the property of Richard III., whose favorite abode it was till he was king. Concerning the herd kept at Gisburne Park in Yorkshire, there is a tradition that they originally belonged to a certain Abbey in Lincolnshire, but when the monks were turned out by Henry VIII., the cattle were "drawn by the power of music," to the new place. That may be pure invention, or it may not be wholly such, for we know that many animals are very sensitive to music and can to a certain extent be influenced by it. That other story, however, that the bulls had "manes like lions" is a myth, since it is a fact that they have almost no manes, though on some the hair is long or curly.

At Bishop Auckland in Durham, there was, says the old narrative, "A daintie, stately parke," "a faire parke by the castille, having fallow deer, wild bulls, and kin" (kine); the cattle, all white, were killed out during the civil wars of the time of Charles I. This was a part of the forest of Weardale: note the beautiful forest names, like Englewood, Needwood, Sherwood, Norwood, Bowland, Teesdale.

There exist now (or did not long ago), a small, inconspicuous herd at Kilmory on the island of Arran, and one at Somerford Park, Chester, the latter so changed from the original type that they have tiny black spots on the neck, sides and legs. At Lyme Park, Chester, a few are kept in the family of Legh, and the breed is as ancient as the park, which was granted to Sir Piers Legh, standard-bearer of the Black Prince at the battle of Crecy. It contains a thousand acres, over which roam the cattle (these have red ears, or sometimes black or blue-black); in the summer keeping off on the high ground, in the winter they resort to the woods, and at that season they used to be fed "on holly boughs before holly became so scarce."

And now we come to the three most noted herds, at Cadyow (or Cadzow), at Chartley, and at Chillingham. Cadyow Castle is in Lanarkshire, Scotland, and the park is a part of the vast Caledonian Forest where Robert Bruce hunted the wild bull in 1320, and James IV. in 1500. It is the seat of the Hamilton family, to whom it was granted by Bruce just after the battle of Bannockburn. There are oaks in existence there, of which Scott said that they might "have witnessed the rites of the Druids." Pictures have been made of them, and they are famous as the "oaks of Cadyow"—giants of the days primeval, gray and shattered, gnarled and time-worn, but sturdy and showing immense girth. There are kept, where their ancestors roamed, a remnant of the wild cattle. Scott describes them in the introduction to the ballad of "Cadyow Castle," where of the hunt, he writes:

"From the thick copse the roebucks bound,
The startled red-deer scuds the plain,
For the hoarse bugle's warrior sound,
Has roused their mountain haunts again.

Through the huge oaks of Evandale,
Whose limbs a thousand years have worn,
What sullen roar comes down the gale,
And drowns the hunter's pealing horn?

Mightiest of all the beasts of chase
That roam in woody Caledon,
Crashing the forest in his race,
The Mountain Bull comes thundering on.

Fierce, on the hunter's quiver'd band,
He rolls his eyes of swarthy glow,
Spurns with black hoof and horn, the sand,
And tosses high his mane of snow."

Chartley Park is in Staffordshire, overlooking the Trent, belonging to Earl Ferris, and is likewise an estate of great antiquity. Elizabeth was there once as a guest, and Mary of Scots as a prisoner. The park is a part of Needwood Forest, and a large tract of it is wild moorland; "the turf is in a primitive state." The cattle have fine pointed horns tipped with black, black muzzles and ears; and the inference is that there are occasional departures even from this type, for a legend runs in the Ferris family that if a black calf is born a member of their race dies; therefore, says the story, the keeper immediately puts to death any such ill-omened new-comer—perhaps averting the calamity by concealing evidence of the event. There is a curious hit in a quaint *Natural History of Staffordshire*, by Robert Plat, Keeper of the Ashmolean Museum, to the effect that if cattle eat the grass that grows in certain localities in that county "they will surely turn out *whitish dun*." He had got fact and fiction confused.

Chartley was visited by Elihu Burritt, who wrote of the cattle as "a kind of white buffaloes, which doubtless in their day and generation supplied the Druids with raw beefsteak." He goes on to say that they are quite untamable, and "the keepers must keep at a respectful distance;" "the touch of a human hand is an abomination to them." When the calves are born far out in the wilderness and need care, the keepers run two fork-handles under them, and so carry them, as on a litter, to the shed. The mothers would desert them if a hand touched them. Bewick, who went to see the cattle and made an engraving of a cow, with great limpid eyes, having a startled look like a hind, tells about the same story, and that if one goes near the calves, "they clap their heads close to the ground, and lie like a hare in form, to hide themselves," and if one should cry out, the whole herd would come bellowing to the rescue.

The herd at Chillingham is best known, and the purest, of beautiful form, with straight backs, "horns of fine texture bending forward and upward," graceful and of distinguished movements, their eyes, eyelashes and tips of the horns black, inside of the ears red or brown. Great pains is taken to keep the stock in perfection and beauty, and if any calves are born feeble they are killed. They are described as having "a thousand peculiarities," some of the ways of the deer, and their cries are like those of wild beasts instead of like ordinary cattle. In the summer they are so shy that one rarely can get sight of them, but in winter they "come down to the inner park" and it is even possible then to go among them, especially on horseback. They come winding down the forest in single file, and they have a habit of wheeling about and galloping off, then wheeling again and facing the supposed danger, then, as if seized by a sudden panic, dashing away to some of their hiding places in the depths of the wood. Much interest has been taken in them by antiquaries and scientific men, and by and by more will be known about the white cattle and their progenitors.

Chillingham Castle belongs to the Earl of Tankerville, and is in the north of England, in Northumberland County, on the Scottish border. It is a region of renown; the domains of the Percys of Chevy Chase bound the park on one side, and the Cheviot Hills are near by.—AMANDO B. HARRIS.

The Old Tinder-box.

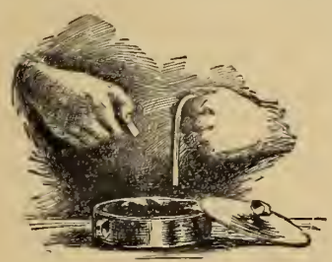
Henry M. Brooks.

PROBABLY there are few children of the present day who have ever seen, or even heard, of the old-fashioned tinder-box and matches. Yet fifty years ago the friction match, now so universally used, had but just been invented, and did not come into general use for many years.

Before the year 1836, or thereabouts, housekeepers were obliged to use matches of domestic manufacture. These were small pieces of white pine wood, perhaps twice the size of our match, the ends of which had been dipped in melted brimstone. A small iron skillet in which to melt the brimstone was once a common kitchen utensil in many families in New England, if not elsewhere.

The only way to light one of these brimstone matches was to bring it in contact with a spark of fire. For this purpose there used to be kept in every house a small tin box filled with burnt rags, and this was called a tinder-box. In order to obtain a light a common gun-flint was struck with considerable force against a piece of steel made of convenient size, which produced a few sparks; these, lodging upon the burnt rags, made sufficient fire to enable one to readily light the match.

These smouldering rags, (for the sparks thus obtained did not produce a blaze) were afterwards extinguished by a round tin cover called a damper. To thus create fire required some experience, especially in damp weather, or with cold fingers on winter mornings. We have known people to make "a bad piece of work" with the flint and steel and to succeed only with great patience in "striking a light." If one happened to be cross or nervous the chances were that he could not succeed at all; nor was it an infrequent sight to see the good wife of the house running across the street with a shovel to borrow a shovelful of "live coals" from a neighbor, the chimney-smoke of whose dwelling proclaimed that she had a fire. The change to the match of commerce was one of the first of what we now consider modern conveniences. In many families it was one of the "children's chores" to prepare wood for the matches, and to dip the ends into melted brimstone. These matches were sometimes to be bought in shops, but New England economy more frequently led each family to prepare its own. Still it was not uncommon for poor children to make a trifle of money by selling bunches of matches to their more fortunate neighbors.



"STRIKING A LIGHT."

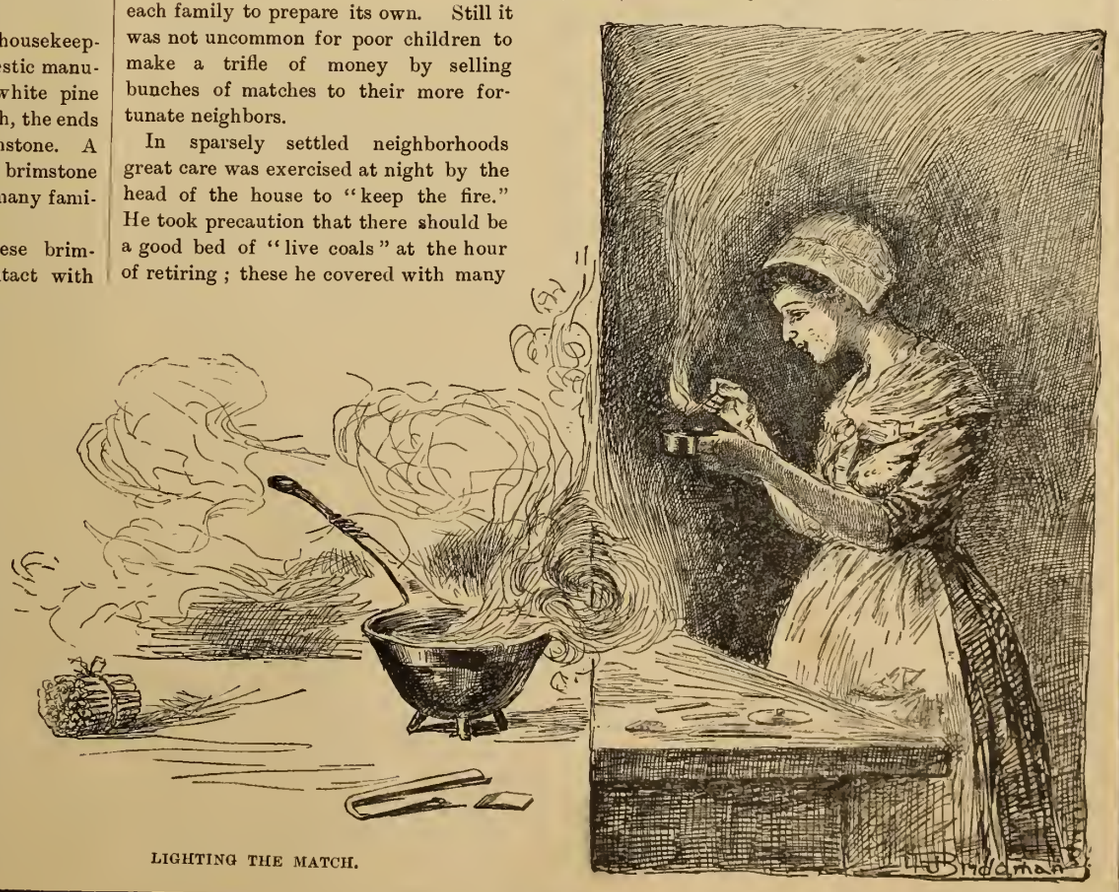
In sparsely settled neighborhoods great care was exercised at night by the head of the house to "keep the fire." He took precaution that there should be a good bed of "live coals" at the hour of retiring; these he covered with many shovelfuls of ashes to prevent them from burning out. The next morning the coals were usually found to be "live" on raking open the ashes, and served to start the day's fire. It was not an impossible feat to thus preserve the family fire through the year, without recourse to tinder-box and matches.

The modern friction match was welcomed by most housekeepers, although here and there some old people objected to it, considering it a dangerous article, as no doubt it is when carelessly used or left lying about. The first friction match invented required to be drawn across a piece of fine sand-paper in order to produce a light. This was called a lucifer, and was much safer, although not so convenient, as the present match. Then came the present patent friction matches, which used to be called "loco-focos." There were no fancy match boxes in "old times" and the tinder-box was not considered an ornamental article, but was kept out of sight in the cupboard or on the kitchen mantel-piece.

We find in a Salem (Mass.) newspaper of June 30, 1836, the following:

A WONDER.

"Notwithstanding the convenience of those dangerous little articles, friction matches. which are in almost everybody's hands, but which with all their charms bid fair to prove a heavy curse to the community, we learn that there is one man in Salem, a respectable tradesman, who keeps a store where we should generally expect to find such things, but who has never sold them, nor allowed them to be used on his premises. At his house and shop, he sticks to the old-fashioned flint, steel and tinder. He shows his wisdom in so doing. How many more can say as much?"—*Wide-Awake.*



LIGHTING THE MATCH.

The Field of Life.

Life's broad acres stretch before you,
Waiting for your toiling hands;
Springtime's gentle showers are falling—
Fair and fertile is the land.

Deep, not shallow, be your furrows—
Sow none but the best of seed;
Summer days will surely yield you
Fruitage plenty for your need.

Rich the harvest you shall gather
In the autumn's golden glow;
Blessings richly crown your pathway,
When shall fall the winter's snow.

—*Mildred Merle.*

THE Dominion Government has shown a progressive spirit in deciding to subsidize a line of steamers for a fortnightly service to Australia and New Zealand. The subsidy offered is £25,000 sterling per annum. The trade between Canada and Australia and New Zealand is increasing rapidly and the opening up of direct communication will enable Canadian manufacturers to compete more successfully with their American and British rivals. By the steamers touching at Honolulu a large trade could be done with the Sandwich Islands.

ABSCONDING bank cashiers and boodle aldermen from the United States will no longer find a haven of refuge in Canada, Mr. Weldon's Extradition Bill having passed the House of Commons. A determined and successful fight was made against the retroactive clause, so that boodlers now in Canada will not be affected. The bill includes murder, counterfeiting, forgery, larceny, embezzlement, obtaining money under false pretences, rape, abduction, burglary, arson, piracy, abortion, breach of trust, and any offence construed as felony by Canadian law. The United States cannot do better than to reciprocate at the earliest opportunity.

DAIRYMEN are to be congratulated upon the organization of the Dominion Dairymen's Association, and it is to be sincerely hoped that their efforts to get the Government to appoint a dairy commissioner will be crowned with success. There are several gentlemen eminently qualified for the position, and no one will question the urgent need of such an appointment. The falling-off in our exports of butter to Great Britain is to be regretted, but now that the importance of the dairy interest to the well-being of the country is being fully recognized a marked increase in our exports of butter coincident with the production of a superior article will no doubt speedily result.

WE have received a book entitled "Insects Injurious to Fruits," by Prof. Saunders, of the Experimental Farm, Ottawa. It is dedicated to the Fruit Growers of America, with an earnest hope that it may be of practical use to them in the warfare with destructive insects in which they are constantly engaged. The book is full of most valuable information and is profusely illustrated. It should be in the hands of every fruit grower. We have also received a parcel of literature from the Immigration Bureau of British Columbia, devoted to the interests of that province. The pamphlets contain many cuts of its beautiful scenery and are full of interesting reading matter for intending settlers.

TEMPERANCE people got a terrific set back last month by the repeal of the Scott Act in two cities and seventeen counties in Ontario and one county in Nova Scotia. It is quite evident that the tide of public opinion has turned and the reason is not far to seek. The Act has not been successful, chiefly through its non-enforcement. Prominent temperance men now say that they will concentrate all their energies upon total prohibition, and will not rest satisfied till the State enforces it. They contend that the liquor traffic is emphatically a social curse and calls for State interference, holding that the good of society should not be subordinated to the liberties of the individual.

A DETERMINED effort is being made in England to injure the Canadian cattle trade by making it compulsory to slaughter the cattle at the port of entry. If this rule were enforced it would make a difference in the price realized of over five dollars per head, which would be so much loss to Canadian farmers. It has been charged that United States people are at the bottom of this attempt to injure our trade, as they are opposed to Canadian cattle having any privilege over foreign cattle, but we are inclined to think that the blame rests with the English farmers. They have succeeded in having Germany scheduled, and are now endeavoring to have Holland placed on the list. They have been rendered desperate through American and Australian competition in their own markets, and will resort to any means to curtail the advantages of foreign stock raisers. It is to be hoped that Canadian exporters will see to it that no cause can be given to the British authorities for acceding to the demands of English farmers so far as Canada's cattle trade is concerned.

PROF. SAUNDERS, of the Experimental Farm, Ottawa, has issued a bulletin of particular interest to farmers. In it he discusses the comparative merits of Red Fife and Ladoga wheats. Last spring he distributed all over the Dominion 1,529 sample bags containing three pounds each, and he had received reports from 301 persons who had sown the samples. These place the period of ripening, taking in the entire Domiuion, for the Ladoga at ten days earlier than Red Fife. Regarding quality, Prof. Saunders' finding is as follows:—That Ladoga is a productive and valuable variety of hard wheat, which has thus far ripened over the whole Dominion ten days earlier on an average than Red Fife. That the better samples obtaiued are fully as rich in gluten as the best Red Fife, and while the cultivation of Red Fife should be recommended in every section of the North-West where it is likely with early sowing to escape autumn frosts, the growth of Ladoga may be safely encouraged wherever the ripening of Red Fife is uncertain, without incurring the risk of materially lowering the reputation or general quality of Canadian hard wheats.

THE condition of farmers in the United States at the present time is not to be envied. A leading Western daily in a recent article, after speaking of the daily life of a farmer, and arguing that farmers' sons have come to look upon poverty in the city as preferable to affluence on the farm, says:—"The American farmer has beeu cheated of the just rewards of his efforts. The food, utensils and public improvements of the continent are maiuly owned by people who did not earn them. Unequal laws have done this deed. How much longer can those laws prevail? Does the desertion of the farm by the sons augur a continuance of agricultural toil? Will men who draw no pay work along for more than one generation? If the young man can earn a good living with ten hours' work in the city, will he accept a task of fifteen hours in the country? And if farming become less diligent, will the city prosper? These matters press for debate, because the gossips assure us the next census will show that the State of Illinois, perhaps the richest plot of ground on earth, the very garden of the world, will record 400,000 desertions of unpaid toilers from the farms. They have been protected, patented, taxed and overworked until complete self-dependence has grown too dear. The mandate of the city master sounds sweeter than the bleating and the lowing of unfed sheep and kine."

A CORRESPONDENT in the last issue of the ILLUSTRATED writing on the "Sparrow Nuisance" suggested a wholesale shooting of these small chirpers. We cannot say that we agree with the proposition to destroy the sparrows, and beg to say a few words in their defence. While the sparrow is no doubt to a certain extent a lover of grain, it is far more a lover of the noxious insects, which are so destructive to the farmer and the fruit grower. Both in spring and the fall the sparrow is a great destroyer of insects. Its chief labor, however, is performed while feeding its young. It has been calculated that a single pair will kill over 3,000 insects in the course of a week, which being multiplied by ten, the length of the breeding season, will give some idea of the tremendous amount of havoc they work among the enemies of grain and fruit. If those farmers who cry out for their wholesale destruction would consider for one moment the beneficial functions of these little birds they would come to a different conclusion. But they are hard to convince, and sparrows and other grub-eating small birds are slaughtered ruthlessly. The result is inevitable. At one time the French were great lovers of minute sport, and killed nearly every small bird in the country; but they paid dearly for their fun, in the shape of enormous plagues of insects, which so devastated the gardens and fields that the Government had to legislate for the protection of small birds. Canadian farmers and fruit growers ought not to be so foolish, and should always bear in mind that to kill the birds that kill the insects that destroy their crops is simply to court ruin.

WHAT'S the matter with the farmers? Notwithstanding the disclosures constantly being made through the press of swindles perpetrated upon them, they still allow themselves to be outwitted by sharpers who play upon their credulity. The latest is the apple tree swindle which is thus described: The agent calls on the farmer to sell him apple trees. He does not ask any pay for them, but simply asks the farmer to plant them on shares. The agent or his company furnishes the trees, the farmer plants them and the company is to get half the fruit for twelve years from time of planting. The farmer binds himself to keep the trees pruned, etc.; also if he sells his farm anytime before the twelve years expired, he must pay for the trees at the rate of $1.50 each. For this he gives a bond of agreement as security to the agent for $500, and this bond is registered against the land without the farmer's knowledge. In the course of two or three months another gentleman comes along looking for a farm. He calls at the house and tells the farmer that his farm is just what he wants. He has the cash to pay down, and he offers him all or more than the farm is worth. They make a deal, but, of course, before he pays any money down he wants to go and examine the registry office, to which place he and the farmer proceed. They find the bond registered against the place for $500, and the farmer rather than miss so good a sale, pays the $500 in order to get a clear title. He then looks for his friend who has purchased his farm, but he is nowhere to be fouud. He only then learns that he has been swindled out of his money. Incredible as it may seem, it is a fact that several farmers in eastern counties have been victims recently of this swindle.

A MOST interesting and instructive report was submitted the other day to the Committee on Agriculture of the House of Commons by a sub-committee, on tuberculosis. It stated that by communicating with farmers and medical men throughout the country 1,408 opinions on the subject of the

disease had been collected. An analysis of the medical opinions showed that from ten to fifteen cases of disease and premature death might be prevented by judicious sanitary measures; that consumption is contagious or infectious, and that isolation would assist in prevention. The chief preventible sources of the disease are contagions, impure air, bad water, decaying animal and vegetable matter, bad drainage, want of cleanliness and sudden changes of temperature. The ordinary measures were suggested as palliative. Some medical men reported that glanders had been communicated from horses to men, and a few asserted that tuberculosis can be transmitted to the human system, as well as diphtheria, by the medium of impure milk and meat. The farmers attributed tuberculosis to want of care in stabling, dirt, impure air, food either too poor or too rich and to heredity. The veterinary surgeons declared that the better bred cattle are more susceptible to disease than poor cattle, being more confined and consequently more delicate. The conclusion of the sub-committee was that the disease is more prevalent than is generally supposed, but that it is not so common here as in Great Britain or the United States. The report suggested that legislation be prepared to check further progress of the disease and that particular care be taken to prevent its importation.

THE subject of forestry is to be made a promi nent feature at the Experimental Farm, Indian Head. Last year a commencement was made with 50,000 forest trees of varieties, which it was supposed would do well on the prairie, and this year an additional number will be planted. By this means settlers on the prairie will know what kind of trees to plant for the protection of their buildings and crops. Speaking of forestry, Mr. R. W. Phipps, Forestry Commissioner of the Ontario Government, in a letter to the press says:—It is most desirable, in view of the evident drying up and consequent inferior fertility of Canadian soil, in those sections whence the forest has been chiefly removed; and the injurious effect on the distribution of the rainfall, that every possible means should be employed to preserve or restore a proper amount of forest or tree shelter of some description in each district—an amount which the best authorities state should never be less than one-fourth. It is true that, taking Ontario as a whole, it possesses a larger proportion than this. But this forest reserve is many miles—in some cases hundreds of miles—north of the principal cultivated portions of Ontario, and is therefore for climatic purposes of little or no use thereto. The lines of trees now being planted by farmers in many localities will undoubtedly serve a good purpose; but better shelter would be obtained, and the farm rendered much more valuable, by plantations of some breadth, comprising thousands of closely planted trees, which would give winter as well as summer shelter, and would in time afford much valuable timber, a result not attainable where trees are planted far apart. A few days spent in such work this spring, with cultivation enough to keep down weeds for a year or two, would add many dollars to the worth of a farm, and be productive of much comfort, if properly placed, to the owner.

SOME people are born grumblers. They have not been so successful in life as their fellows and they continue to grumble and growl and attribute all sorts of things to their non-success, never thinking for a moment that they have themselves entirely to blame. They have neglected their opportunities or have frittered away the best years of their lives waiting Micawber-like for something to turn up. These are not the men who succeed in the world. Capacity for work and the ability to do easily the right thing at the right time are the qualities that distinguish the successful from the unsuccessful man. And these are manifested from the lowest grade of labor to the highest. Of two men with shovels in their hands, one will remain a mere shoveler and drudge all his life, while the other will rise to be a boss and contractor. Of two clerks, with precisely the same opportunities, one will remain behind the counter or at his desk, while the other will grow into proprietorship and wealth. Of two farmers, who may settle on adjoining farms, one will amass wealth and rise to eminence, while the other will remain in poverty and obscurity. And so instances in every pursuit of life familiar to all might be multiplied, illustrating how one man forges ahead of another, both having started from the same post with the same goal in view. Nor can we easily tell wherein this difference in performance lies. It not infrequently seems as if the unsuccessful man was the most industrious and busiest man. His hands are so full that things slip through his fingers, and he rushes, hither and thither, every moment occupied. He is apparently so busy that he has no time for anything and there is no hour of the day he can call his own. On the other hand, the successful man never appears to be without abundance of leisure. The world-compellers are never in a hurry; for them there is a time for everything. No man tresspasses on them, for they listen with patience to every caller and give heed to every demand, but they know how to decide as well as to listen, and all their communications are yea, yea, or nay, nay. Serenity of mind seems to be their most striking characteristic, and so they rise equal to every occasion. To a man possessed of patience, perseverance, energy and grit all things are possible. When such a man starts out in life with a determination to accomplish something and goes to work in a deliberate manner, willing to get ahead a step at a time, being careful when an upward turn is made to put on the brakes and block the wheels so that there is no slipping back, then he is sure to succeed.

A CABLEGRAM was published in the daily papers, a few days ago to the effect that it had now been discovered that Queen Natalie's expulsion from Servia and King Milan's abdication in favor of his son were due to hypnotism. Mme. Christich, the wife of the Prime Minister, and her sister, are, it is said, enthusiastic students of hypnotism, and King Milan was one of the former's chosen subjects. She obtained, by this means, such a power over the King that he had no will of his own, and it is now generally conceded that she has been running the Government for years by hypnotism. Mesmerism, or, as it is now called, hypnotism, is taking such an important part in public affairs, more particularly in Europe, that it will either medically or experimentally have to be placed under official supervision. It may be true that in proper hands it is a medium through which relief can be afforded to sufferers of a special kind, but if the practice in the hands of unprincipled men may be turned into an instrument of evil as well as good, indiscriminate and unregulated use of it should hardly be allowed even to physicians. Hypnotism has been less resorted to on this continent than on the continent of Europe, where in more than one medical institution it has been much used and where experiments on susceptible subjects are freely made. Recently experiments were made by a physician for the purpose of demonstrating to what extent the practice might be subordinated to the commission of crime. He induced one of his subjects to rob a house under hypnotic "suggestion." The affair was, of course, pre-arranged—the house was fixed on, and the involuntary depredator watched. Obeying the suggestion of the operator, he proceeded to the selected dwelling house, entered it, secured an imaginary heap of gold, purloined a number of other articles, and brought the whole away. Another subject was induced to kill himself while in the hypnotic state. He was supplied with an unloaded pistol, which he placed to his heart and snapped. The experiment was highly reprehensible, though no evil effects followed. By such means, it has been remarked, "a really honest clerk, with the keys of his employer's office and safe under his care, might be made to commit a burglary; the heir to an estate might be induced to commit suicide; a trustworthy servant to commit murder or arson."

Binder Twine.

As the season is now rapidly advancing when farmers must be looking for their supplies of binder twine to use in taking off their harvest, we feel it a duty devolving upon us, owing to the present high prices existing for this article, to give our views on the matter. There is no doubt many farmers are under the impression that some one is responsible for the great increase of prices in this article over what it has been sold at for the past six or seven years, and in this age of trusts and combines they naturally, without giving the matter much consideration or thought, lay a very great deal of the blame upon the manufacturers of the twine or upon the manufacturers of binders, neither of whom, we believe, are in any way responsible for the excessively high prices which are being asked to-day for this commodity, as we are quite sure that nothing in the shape of a combination of the manufacturers of binders or the manufacturers of twine is in existence in this country. It is a very evident fact that twine can not nor will not be sold so cheaply this year as it has been during the past few seasons, but we think there will be no cause for farmers to imagine that twine will reach the enormous figure that we have heard remarked by some that it will do. Supply and demand will regulate from year to year the price of hemp for the manufacture of binder twine, equally as much so as the products of our Canadian farms. The demand for hemp to manufacture into binder twine has increased from 1881 from 5,000 tons up to somewhere, in the season of 1889, between 50,000 and 60,000 tons. This, together with the largely increased demand for marine purposes, makes a heavy drain upon the product. Every one no doubt knows that the shipping interests of the world are to-day in a greater state of prosperity than they have been for a great number of years back, and the demand for manila hemp to manufacture into ropes and other material used in shipping has been very great; and, furthermore, many are probably not acquainted with the fact that in all the electric light systems throughout the entire world a large quantity of manila hemp is used for the protection of the wires.

We must not overlook the fact of the small territories upon which the world is depending for their supplies of this material. Manila hemp is raised only in the Philippine Islands, the hemp deriving its name from the chief port of those islands, which is distant from the markets of the world some four or five months' journey; consequently supplies are not very readily obtainable, and should there be a quick demand for material it would be impossible for manufacturers to get it in a less time than above stated. The sisal hemp, which is also used considerably in the manufacture of binder twine, although much less so during the past two years (owing to its high price compared with that of previous years), is raised only in the Province of Yucatan, a territory subject to Mexico. The producers of this article are not so progressive as those people living in more northern climes, and it is with great difficulty that an increased acreage for the production of these hemps can be made; in fact we may say that manila is a product that is not raised outside of the Philippine Islands and sisal outside of Yucatan. We learn, however, that experiments are now being made on some of the West India Islands for the purpose of growing the sisal plant, and if the same should prove to be satisfactory, we may look, in the near future, for much larger supplies and likely much cheaper rates. For a matter of information, and that the farmers may not run away with the idea that the manufacturers of binders or binder twine are combining to extort large profits out of the farmers, we would quote from the prices which have been ruling recently in New York and Boston markets. Manila hemp has in some instances been sold as high as 15½c per lb. To this have to be added various expenses in the shape of freight to the factories; shrinkage in the weight of the bales, as they have to be accepted at the weights marked upon them before leaving the Philippine Islands, and there is usually a shrinkage of not less than about 100 pounds to the ton; then there is the cost of manufacturing it into twine, and the cost of freight again to the farmers; and we think if farmers will weigh these things in their own minds they will readily see that twine cannot be sold as cheaply as they may have anticipated, but we believe that we can assure them, on the part of all binder manufacturers and dealers in binder twine, that it will be retailed to them at the very lowest price possible, consistent with its cost of manufacture and purchase.

Reward.

If farmers, who have discovered ingenious methods in connection with their work which would be of use to their fellow farmers, will write us and describe the same, furnishing a sketch when practicable, we will reward them by publishing them over their names, with an illustration when possible; and further, when we consider the plans or ideas advanced have *special* merit we will remit them amounts varying from 75c to $5.00, in proportion to our estimate of their value to our readers.

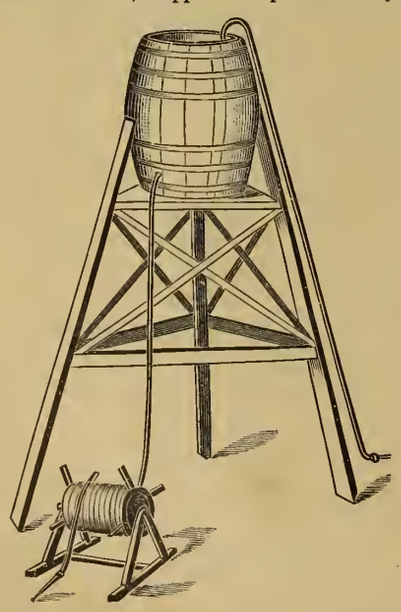
A valuable lawn dressing is made by burning refuse piles with old sod throwu on to become charred and cause the whole to smoulder. The product is rich and cheap, and is within the reach of everybody.

Mr. Walter Hick, Goderich, writes us:—"Last year I had a fine piece of wheat that was totally ruined from a Barberry hedge. Another piece, I think, was ruined by the Hessian fly, as it went into winter quarters splendid; but alas, in the spring it was a good deal bare ground, the field dry and well drained."

Reports received from all sections of Ontario to the end of April show that the general outlook is cheering. The farmers are all agreed that spring this year opened earlier than on any former occasion within their memory, and as a result seeding is being completed from two to four weeks ahead of former years. The weather has been favorable for the operations and the best results are hoped for. Fall wheat, as far as known, shows a healthy condition, and while not so largely sown as last year, it is expected to be a good crop. The recent rains had a beneficial effect upon meadow lands, and an abundant and large supply of grass is looked for. Farmers are jubilant over present prospects.

A Neat and Cheap Tank.

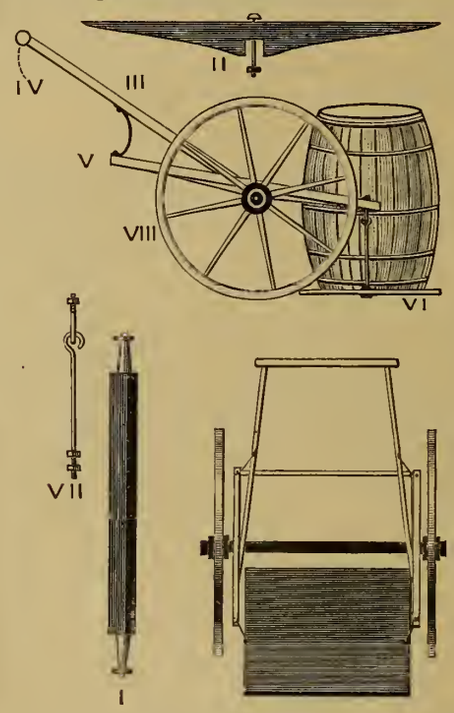
Dr. Baisely, of East Rockaway, L.I., has devised a neat, cheap and exceedingly useful tank for watering the garden, chickens, etc. It consists of a whisky barrel (our temperance friends might use a kerosene barrel) supported upon three joists



properly braced. It is filled by an ordinary force pump. The water is distributed by a small hose with a spray nozzle. It would be very easy to arrange it so that a water trough for cattle or fowls could be kept full all the time. All that is required to make it water-tight are three joists and two or three pieces of boards to hold the barrel and to act as braces. The whole thing could be built and painted in a couple of hours and need not cost over a couple of dollars. It will force water a hundred feet or more, and all the effects of a water supply with a pressure may be obtained.—*Rural New Yorker.*

A Handy Hand Cart.

Mr. J. F. Smith, of Cobourg, Ont., writes us as follows:—Seeing in the Illustrated for February a request for description and designs of useful articles, I send a rough sketch and description of an article which I have proven to be very handy. It is a hand cart, for carrying milk can to stand, wheeling apples in barrels from orchard and carrying heavy weights about, requiring no lifting to load and unload, as the platform rests on the ground when standing. Almost any old wheels may be used. Mine are from a two-horse cultivator, but old buggy or sulky-rake wheels will do. The axle may be of wood or iron; mine is maple with bearings turned to fit the wheels.



SIZES OF MATERIAL REQUIRED.

(I)—Axle, 3 ft. 8 in. long, 1½ in. thick, 3 in. wide.
(II)—Collar, 2 ft. 8 in. long, 1½ in. thick, 4 in. wide in centre.
(III)—Handles, 3 ft. long, 1¼ in. thick, 1½ in. wide.
(IV)—Handpiece, 23 in. long, 1½ in. round.
(V)—Cross piece, 25 in. wide, 1½ in. round.
(VI)—Platform, 20 in. by 25 in. square.
(VII)—Rods, about 15 in. long, ½ in. thick.
(VIII)—Wheels, from 3 to 4 ft.

The platform may be hung closer to the axle than shown and the can or barrel will lean against the axle.

One of our successful cultivators of plants believes that syringing them with pure water is the first cause of success. He says: "Do not drench them and never allow them to become so dry as to wilt. Do not allow water to stand in the saucers, but vessels of water placed among window plants guard against the hot, dry atmosphere that is like poison to plant life. Ants and most other insects do not like camphor; a piece the size of a peanut in a quart of hot water is enough. Three pounds of tobacco stems to a barrel of water is a good proportion, and for lime water 1 quart of unslacked lime to 10 gallons of water. Let the lime settle to the bottom and do not disturb it; the water is wanted, not the whitewash."—*The American Garden.*

Even a small farm must have more or less machinery, while on a large one the investment must be heavy. Under any conditions more machinery will be destroyed by rust than by wear. A little care will prevent this. Melt together over a gentle fire a pound of lard free from salt and a lump of rosin about the size of a hickory nut. When the whole is melted remove it from the stove, and stir it slowly until cold. Keep this covered from dust. Whenever any machine, from an apple parer to a threshing machine, is out of use, clean it by scraping with a wooden knife whittled from any hard wood, use an old woollen rag and rub over every part liable to rust with this compound; give all such parts a thin coating. This may be used for astronomical and other delicate instruments. If used on every farm it would save the country millions of dollars.—*American Agriculturist.*

We have already urged upon farmers the necessity of having a vegetable garden and fruit garden on their farms. A large number of farms have a small piece of ground where vegetables, fruits and flowers are crowded together without system and with very little thought for their usefulness, but what is needed is a good generous space, properly enriched, where an abundance can be raised to supply the earliest, the best and all that may be needed of vegetables and fruit in the family for the entire year. Have a piece large enough to be worked by the plow and the cultivator. It is not too late to have at least a portion of these things this year. The cow stable and the hog pen composts are the best supply for the enrichment of these gardens, mixed thoroughly into the soil at a good depth. But remember it is not enough to plant the garden and then leave it to take care of itself; thorough and continued cultivation is as important as plenty of manure; one without the other will only give partial success.

An old farmer being asked the secret of his large crops replied:—"I tell my men to harrow the ground until they think it is harrowed twice as much as it ought to be, and then tell them it is not harrowed half enough." Some farmers are afraid to disturb the soil in the spring where winter grain is growing, but from experiments made it has been proved that it will increase the product of the grain ou an average at least five bushels per acre. Strong or rather very heavy soils form a crust during the time after sowing of the wheat in autumn and its starting again in spring; and breaking this crust with a fine light harrow is quite a benefit to the crop. The work may be done as soon as the ground is dry enough to bear the tread of horses; the wheat having become strong enough to hold its place while the harrow-teeth pass over it. It is less important for light soils, but often of much use in destroying young starting weeds. Weeds are bold robbers; they shorten your crop, carry away your grain and laugh at your empty pocket."

Live Stock.

Suggestions to Sheep Breeders.

BY MR. JOHN HALLAM, TORONTO.

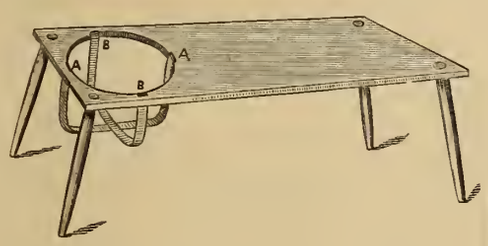
Fully one-fourth of the clip from the sheep grown in Ontario is offered in an unmarketable condition. The wool is cotted, chaffy and mixed with seeds and burrs, which lessens the value from 4 to 5 cents to the manufacturer. If a little more care was taken by the farmers to prevent their sheep from running at large, feeding around straw stacks and amongst thistles—to choose clean places for washing and shearing, so as to keep the wool free from these impurities—I am sure the value of the entire clip would be increased from one to two cents a pound. . . . Many farmers ask why we do not grow more fine wool in Canada and import less. My reply to this is that we cannot grow the finer grades in Canada to pay and compete with Cape, Australia, Buenos Ayres and Montevideo wools, hence we have to import them as they are necessary to the success of our manufacturers. We can grow long and medium wools and find a ready and a profitable market for both the mutton and wool. If I were a farmer in Ontario and had the means and inclination to be a stock breeder, I would sieze on one leading breed of sheep, such as Leicester, Shropshire or Southdown, and run it for

all it was worth, for I think there is nothing so profitable to the farmer as sheep breeding when carried on economically and with a determination to succeed. . . . The opening up of the great North-west of Canada is developing a new feature in the sheep industry of this country. The broad prairies east of the Rocky Mountains and skirting the Bow River are highly suitable for sheep raising. There are now to be seen large flocks of Montana sheep grazing on the luxurious grasses of these plains. This sheep is of the Merino type, close woolled, hardy, and seems well adapted to the country. The wool is fine medium, and desirable for fancy flannels, but too brittle for hosiery and knitted goods. I think it might be greatly improved by judicious crossing with some of the English thoroughbreds which would produce wools, if not finer, of a stronger and more elastic staple, better suited for flannels, hosiery and knitted goods, and would in the near future replace considerable wool that we now import. But whatever improvement must be in close-woolled sheep, as the long-woolled sheep would not be suitable to the climate, the object being to keep the fleeces clean and compact. The pelt is not so valuable as that of the Leicester, Cotswold, or other breeds of this type. Owing to its being wrinkled on the neck and if anything more tender, it is of less value for leather purposes. . . . Sheep husbandry is meeting with keen competition, not only with regard to the production of wool, but to the mutton also. The question now is, which is the best sheep that will give the greatest amount of profit, and pay for the labor expended on its care? This, in my opinion, depends very much on the climate and soil where the sheep are to be kept, and the readiness to a market for the sale of the mutton and wool. The sheep masters of Alberta are at a disadvantage here, as the Canadian Pacific Railway subjects them to outrageous rates for conveying sheep and wool from Calgary and stations east, in some instances charging as high as three cents per pound on unwashed wool, to Toronto. . . . This brings me to a very curious question—what effect has climate and soil on wools? I find on the north shore of Lake Erie, the district of St. Thomas, all through the County of Middlesex, down the main line of the Grand Trunk from Point Edward to St. Mary's, also in the Bay of Quinte district, including Kingston, that wools clipped from Leicester, Cotswold and Shropshire are finer and more lustrous than wools clipped from the same class of sheep in the districts round Stratford, Berlin, Guelph, Toronto, Pickering, Newmarket and Markham, and are worth fully two cents more per pound for exportation. I am not prepared to say whether it is the climate or the soil that causes this difference, but such is the case. In my opinion the best classes of sheep for the farmers of Ontario, for both mutton and wool, are the Leicester, Shropshire, Cotswold and Southdown. If the wool is low they have a fine carcass of mutton, which always commands the highest price for home consumption and exportation to Great Britain. Merinoes may do very well for crossing with some of the more robust kind, but as grade sheep they would not be so profitable.

PROF. HENRY STEWART, in the *Rural New Yorker* says:—In choosing foods for butter-making the effect upon the character of the butter is to be considered more than the fat contained in it. It has been found by experiment and long practice in medical and physiological investigations, that the fats of the food are emulsified with the pancreatic fluid and are absorbed by the intestines directly into the blood without alteration; and the use of fatty matters as medicine is controlled by this well known fact. As the fat of the milk is derived from the blood the food must necessarily exert an influence upon the character of the butter, and this is clearly proved by practice in the dairy. Linseed-oil-cake meal, which is rich in fat, of which the flavor is bad, makes poor butter, while that of cotton-seed meal, which has a bland, sweet and nutty-flavored oil, equal to the very finest quality of olive oil, and has also a rich yellow color, makes the finest butter. The fat of oats is white and hard and makes inferior butter; that of cornmeal is much better. Hence oats cannot be considered as a good food for butter-making cows. The action on the digestive organs is also to be considered and it is found that bran has a good effect in this way. Hence the most desirable food for butter cows is made up of corn-meal and bran in equal parts and as much cotton-seed meal as can be given healthfully, which is about one-eighth part of the whole grain food, or one pound of the cotton meal to four pounds each of corn-meal and bran. This may be considered as a standard ration for a 1,000-pound cow, to be increased as the cow can profitably dispose of it; some cows will consume this quantity at one feed, and increase in yield on it; others cannot digest it. This is to be found by testing the cows with caution, stopping at the point of safety.

A Milking Stool.

MR. CARTER BEATTY, Palgrave, Ont., sends us the following description of a milking stool, which can be easily made:—I saw by your paper that you solicited patterns of anything that would lessen labor on the farm. Below I give you a description of a milking stool, and if you think it worth publication, please do so. My uncle was the only person I ever saw with one. He invented it for his own accommodation, as he had a great many cows to milk.



The dimensions are as follows: Take a pine board 3 ft. x 1 ft. 3 in. x 1 or 1¼ in. About 2 in. from one end cut a round hole about 1 ft. in diameter which will let a wooden pail down about to the ears. Take a strap about 2 ft. long, tack the ends in the grooves at A A; take another strap the same length and tack the ends in the grooves at B B; by means of these straps almost any sized pail may be used. Bore a hole near each corner of the board for the legs, the holes to be slanted, which enables the stool to stand more firmly. A cleat across each end of the seat where the legs are inserted will keep it from splitting. Make the legs about 1 ft. long. People should use their own judgment about the length of the legs, as hardly two persons require the same length.

GIVE the cows plenty of pure water and as often as they want it.

EVERY time you worry horses you shorten their lives and days of usefulness.

CHANGE the feed of your horses often enough to make them relish it. Improper feeding is the cause of nine out of ten cases of sickness among horses.

EXPERIMENTS in feeding pigs, instituted by the Danish Agricultural Society, go to show that skimmed milk has double the feeding value of buttermilk; that rye and barley are of about equal value, with a slight percentage in favor of rye; and that six pounds of skimmed milk have the same feeding value as one pound of rye or barley.

The Poultry Yard.

A HEN may lay a bushel of eggs,
And cackle around all day;
But she can't lay a carpet to save her legs
Because she ain't built that way. —*Ex.*

ONE egg per week will pay all expenses of keep and every egg over is profit. The greater the number of eggs secured the lower the cost of each egg proportionately.

EGGS from hens well fed on nutritious and wholesome grain in variety, will partake in a great degree, the flavor and quality of the food, and the flesh will also partake of the quality of the food consumed.

POULTRY yards should be spaded or plowed, and where alternate yards can be used, it is well to sow the yard not in use, with clover and oats. These will make a rapid growth and can be used in June, when the other yard can be likewise prepared and sowed with the same seeds. We keep our runs seeded in this way, and it is astonishing what amount of green food a dozen hens will consume. Try it.—*Poultry Bulletin.*

SOMETIMES it is not easy to decide how to start. The first thing for the beginner is to determine what breed he likes best, and that would be suitable to his purpose, no matter what others may like or select for their use. You must individually suit your own tastes and purposes, or you will never be satisfied. After having decided, the next thing to consider is of whom you will purchase. It is not best to start on a cheap plan, as a general rule it is with poultry as with other things, the cheapest is the dearest in the end. Do not canvass the country to find the man who sells eggs or birds at low prices, but rather find one who sells the best stock at reasonable prices.

A HEN that once becomes addicted to the bad habit of egg-eating can not easily be broken. If a not very valuable hen should be discovered in this "cannibalistic act," she should be immediately killed, as, unless a very valuable fowl, it will not pay to fool with her one minute, and she would soon teach the whole flock to "help themselves." If the bird should be a very valuable one, she should be immediately separated from the flock, for the above-stated reason, and a process of "crow eat crow" warfare commenced. As soon as the aristocratical-notioned "galus bankiva" becomes acquainted with her new quarters, she should be led to think that her delicate, highly-refined tastes are understood, and highly sympathized with by her proprietor. A nice newly laid egg (we don't mean a geuuine, hard pan, warranted to-be-just-as-advertised egg, but one which contains about 75 per cent. of pepper commingled with about 25 per cent. of ginger). This should be slyly laid upon the floor, while biddy's attention is called in another direction, and then the "operator" should cautiously retire from the scene, and after securing a lofty and safe position upon the outside, he should gaze with a long-range telescope upon that poor, deluded, misguided fowl, as she partakes of her surprisingly warm repast. Those who doubt the ability of a hen to trip the "light fantastic toe," should secure front seats. We have never been able to persuade a hen to take more than the third mouthful; they apparently coincide in the opinion that that is the proper point to go out of the egg-eating business, and further, never again will they look an egg in the face after partaking of this mixture! Try it, ye brethren who are thusly afflicted; it is sure.—*W. M. Barnum, in Poultryman's Journal.*

Pithily Put Pickings.

A FARMER can till his land too often but not too well. . . . What is wanted to make farming successful is men who have ambition to make their calling honorable. . . . Aim for better farming this year rather than more farming.—*Agricultural Epitomist.*

THE wise creditor is slow to lend to the man who has scrubby cattle. . . . The best, which is not always the highest priced, is the cheapest. . . . Success depends even more upon correct methods than upon hard work. . . . Some positively lazy men honestly believe they are only economical. . . . Neither social obligations nor good morals require you to lend to him who does not take good care of tools, or who does not return them promptly —*American Agriculturist.*

IMPORTANCE should be given to every thing which promises to lighten the labor in the home. Woman's work on the farm is burdensome. Welcome canneries; welcome creameries. . . . It is to be hoped that the day will come when all farmers will strive to make their families as comfortable as they make cattle, and their own dwellings as attractive as their barns.—*Maryland Farmer.*

ONE of the surest roads to success on a small farm is promptness. I know of nothing that causes more failures than the want of it.—*Massachusetts Ploughman.*

IF you want to make a good hired man feel discontented get him to do all the work of caring for the farm team and then drive the team yourself. The man who takes care of the team ought to drive it—that is, if you want the best work the team can do.—*Rural New Yorker.*

THE farmer who is "well up" in his business will never call anything "good enough" which can be bettered. . . . "It takes but little to make the farmer rich." True, Mr. Wiseman, but it seems dreadful hard to get the "little." . . . Providence was the friend of the improvident farmer this spring—he didn't have to dig his seeder out of a snow drift.—*Farm, Stock and Home.*

Ensilage and the Silo.

USEFUL INFORMATION GLEANED FROM VARIOUS SOURCES—CROPS—CONSTRUCTION AND FILLING OF THE SILO.

We have received several communications from farmers asking us to give them information regarding Ensilage and the Silo. It is evident that although the silo has as yet made little headway in Canada, there is a growing interest among farmers in the question of ensilage as food for their stock, and now that the Dominion Government has decided to place upon the free list grain and seeds imported and sown for the production of crops for the silo, this system of feeding will no doubt become general.

CROPS FOR THE SILO.

A writer in the *Tasmanian Agriculturist* says:—"Any vegetation that stock will eat in its natural state will make good ensilage, and it will be much improved by the operation, especially if fed to cattle. It is said that cattle assimilate ensilage better than they do any other food, and the reason for that is that the change effected in the silo is nearly or quite that which is brought about in the first stomach of the ruminant animal. I have found barley and tares sown immediately after the first rains very suitable and profitable for the first filling. Cockspurs variegated and Scotch thistles, if put away in a succulent condition, can be taken out six months after in prime condition, and stock will devour them ravenously. In short the silo has been styled 'the farmers' save all;' nothing can come amiss to it. Mangold or turnip tops, cabbage leaves, surplus fodder of any kind can be siloed and kept until periods of want." A farmer in the Southern States says:—"Last year I grew fine crops of two or three kinds of cow peas, and of the soja bean, on laud pretty well worn, part dry and part in need of draining, and without manure. Both were just at the right age or stage for ensilage, just forming pods, when my ensilage corn was ready. Accordingly I used them to mix with corn in the silo. One pit was filled very satisfactorily with corn and soja beans, in alternate layers of ten to twelve inches thick as put in, all cut into half-inch lengths. I have found this an excellent ensilage and a 'complete' food." The corn best suited for the purpose in Canada is the "Giant Prolific Sweet Ensilage" introduced by the Steele Bros. Co., Toronto. As to the mode to be adopted in raising the stocks, *The Cultivator and Country Gentleman* says:—"Two modes are adopted in raising the stocks—planting in thick drills, and thus obtaining the heaviest crop, with no grain; or thinner, and obtaining fewer stocks, with some corn. The grain obviates feeding dry meal with the ensilage, and is believed by many to be more profitable than the heavier thick crop requiring some meal. The best ensilage is obtained by allowing the stalks to ripen enough and letting the grain glaze, and the leaves to dry on their edges. Failure results when cutting too green. From four to six inches apart in the row is a suitable distance for the stalks; small corn and sweet corn nearer than large southern corn. The amount of fodder which may be grown on an acre depends chiefly on the richness of the soil. Common or good growing northern corn, planted thicker than large southern, will yield from fifteen to twenty tons of green stalks to the acre on rich land. Large corn will yield rather more in stalks but less in grain." A prominent farmer gives the result of his experience as follows:—Sow the corn in drills just as thin as it can be put in the ground; that is, thin enough so that every stalk will have a fully grown ear. Hand work is too expensive. Take a smoothing harrow and go over the field any way you please, so soon as a crust forms on the ground. Thousands of weed seeds just ready to germinate will be killed by this process, which should be continued until the corn is five or six inches high. Then put in the cultivator, running it deep and close to the rows at first and gradually narrowing and running more shallow until the corn is too large to cultivate. Cut when it is fully developed and at about the same time as if it was to be shocked and husked. He thinks, after seven years' experience, that it pays to cut the corn before putting in the silo. If cut into four or five-inch lengths it will be more thoroughly masticated, and it heats up better than if cut shorter. Another authority says that cutting the fodder half an inch in length admits closer packing in the silo, and prevents the making of long fibrous manure. If three or four inches, it is better than the whole length.

THE SILO.

To farmers preparing to build siloes the following suggestions will be found useful: Siloes should be made deep or high when practicable, so that the ensilage itself may exert a pressure on all below. The bottom should be on a level with the stable floor, so as to admit of easier feeding. It may be filled in at the top, either by means of a carrier driven by the machine in cutting, or on an elevated bridge or causeway. If the silo stands on a steep hillside, an earth road may be made to carry up the loads of stalks to the cutter and silo. The silo may be constructed of timber and plank, nailed on the two sides of a stiff timber frame forming an air-space lined with tarred building paper, to make it air-tight and prevent freezing much. If the planks are well soaked with petroleum, they will last many years. The portion next to earth may be treated with gas tar; or it may be of masonry. A plank door, capable of being strongly barred, should open next to the passage towards the stable. If the walls are fairly even, it will make no difference in the settling of the ensilage whether the planks are set upright or horizontal. The bottom or floor should have perfect drainage. Siloes of moderate size, or larger ones with divisions, are more convenient for filling and emptying, provided the cutter can be easily placed to feed all. A silo with the boards running vertically and nailed to girts about three feet apart, is said to be stronger and less liable to spread than those built in the usual way with the studding running up and down. Studding should be at least 2 by 10 or 2 by 12, and even larger if the silo is more than 20 feet deep. Double boarding, with paper between, on each side of the girts, will prevent freezing even at 24° below zero.

FILLING THE SILO.

Thoroughly tramp around the edges of the silo in filling; the central portion will become solid without much tramping. Weighting the silo packs the top layer more nearly air-tight; leaving it exposed causes several inches to rot on the top. A layer of several inches of dry straw holds a portion of the steam from the hot ensilage and tends to lessen the rotting. A weight of a hundred pounds to the square foot is ample. It may be stones laid on plank cover; or it may be sand, sawdust, earth, bags of grain, or tubs of water on the plank, according to convenience. Weights are better than screws, because continuous. Some farmers, however, think that weighting a silo is unnecessary; they put on about two feet of straw, cut preferred, and some boards on top to compact the straw. After filling the silo, during successive days, the contents will settle in the course of a week or two, to about two-thirds of their former bulk. Ensilage, after settling, will weigh about 45 pounds to the cubic foot if cut short and weighted heavily; but will be considerably less in weight at top if cut longer and not weighted.

In feeding out expose as little of the ensilage to the air as convenient, either by cutting down perpendicularly in successive sections, or in small siloes with large herds, by taking off successive layers over the whole surface. A successful farmer says that by keeping the cows in a warm stable nearly all the time in winter and feeding ensilage, the profits can be increased more than one-half. He feeds about 6 quarts of bran and 2 quarts of cottonseed meal a day, mixed with about 40 lbs. of ensilage. He objects to the common practice of cutting down the silo as the air will affect it more or less, and it will not make a fine quality of butter if left very long exposed. Unless the silo is very large, he prefers to take a layer from the top of the silo each day, thus having it always fresh. It is claimed that ensilage has nearly the same advantages as green food given in summer.

CONDUCTED BY J. B. HARRIS.

One of the employés writes us referring to the short article in last month's issue, the theme of which was the attitude of the workingman towards the church, and suggests that some steps should be taken to inaugurate a short noon meeting among the men, if only for ten minutes daily, to speak of this great question which concerns us all. What do readers of this column think of such a suggestion? A few no doubt would be glad to see it carried out; a greater number will perhaps laugh at it and pooh-pooh it as nonsense, and the great majority will, we dare say, simply refuse to exercise any thought one way or the other.

And yet this question of our future life is a serious question. That is, it is a serious question if man is immortal. If he is not, of course it does not matter so much. If the short course we run here on earth is to be the whole race, if the goal of death o'er-tops the abyss of oblivion into which the runners plunge one by one when the race is over, to meet eternal forgetfulness, then of course time spent in writing and talking about an immortal state is so much time lost. But who can say? Some of us have been spectators as well as actors in the arena of life for seventy years, some sixty, some fifty, some forty, some thirty, some twenty. We are moving to the end ourselves, and we hear and see about us on every side the rushing of swift feet towards the inevitable doom of us all. We have striven—as the dark curtains which divide this life from the unknown have been thrust aside a moment for the passage of a friend or neighbor, we have striven—strained our eyes, to catch a glimpse of the beyond and have always failed. By and bye we shall pass through ourselves and then we shall either know or be incapable of knowing.

And in the meantime are we satisfied to let things go and take the chances? "To be or not to be." If we are quite certain it is "*not to be*," what odds? We can afford to smile at the fanaticism that keeps on ringing the alarm bells of a superstitious belief when we *know* that this life is the "be-all and the end-all." Why should we not enjoy ourselves? So long as we live decent lives—indeed, no matter whether our lives are decent or not—we shall get through all right and drink at last the welcome waters of Lethe. But if it is *to be*, what then? If there is a voice within us which tells us this earth is *not* all—that there is another life beyond the grave—then perhaps it would be wise to stop and consider what *our* state shall be when the curtain is thrust aside for *us*.

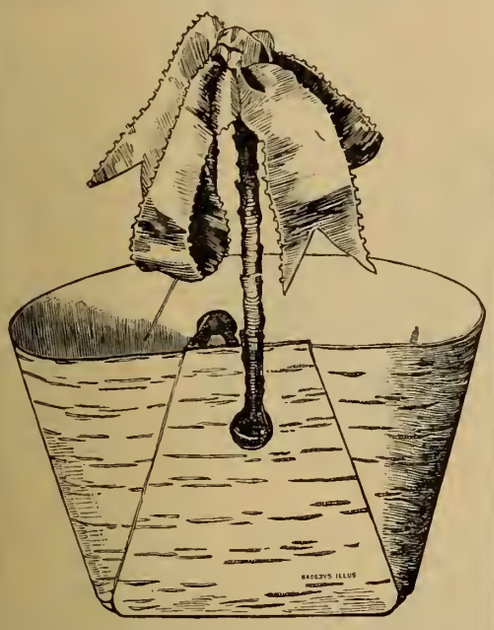
If we concede the future life, then the further questions immediately spring up—Is this future life to be a life of happiness and enjoyment, or is it to be a life in which sin and suffering are still possible? Is there any preparation needed here to fit us for the life to come? If so, what means can we use to this end? Now these are important questions, but how many of us ever ask them of ourselves? Perhaps if a few were to come together as suggested by our correspondent, it might have the effect of awakening an interest in this subject, which would be beneficial to some.

CONDUCTED BY AUNT TUTU.

(Communications intended for this Department should be addressed to AUNT TUTU, care MASSEY PRESS, Massey Street, Toronto.)

A Luncheon Favor.

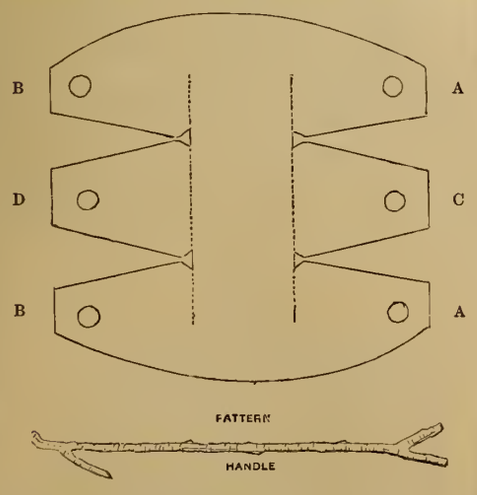
THIS delicate little basket is made of birch bark. The handle is made of a small twig, and ornamented with bows of narrow bright ribbon. When filled with flowers or bon-bons it is very pretty; and



when one is placed at the plate of each guest at a lunch party, it helps to furnish the table and make it very attractive. The basket, when completed, should not be larger than a small-sized tea-cup.

When birch bark is not to be had, stiff paper or Whatman's rough drawing or water-color paper may be used. In this case the paper may be decorated with water-colors or gilded or bronzed to suit the fancy or skill of the maker.

Take a piece of birch bark about seven inches square. It will be well to practice on a piece of waste paper, until the desired proportions are found. Cut the birch bark by the pattern, bend the sides towards the centre, as seen in the dotted



lines, and after smoothing them out again so that the bark lies flat as at first, bring the two holes marked A together, and holding them in one hand, bring together the openings on the opposite side marked B; next carry the opening C up to fit those marked A, and D to fit B.

Have the handle (made of a forked twig according to pattern) ready, and slip it in place as in the illustration. Should your basket be of paper, make the handle of paper also.

These baskets, made larger or smaller as you may wish, will make pretty additions for a children's tea-party, or to hang upon a Christmas tree, or, filled with damp moss and flowers, a very acceptable offering to an invalid friend. — *Youth's Companion.*

Five Good Things to Know.

1. THAT most persons suffering from a cold on the chest can be greatly relieved by eating boiled or roasted onions. They will be found to be a most excellent remedy for a cough and the clogging of the bronchial tubes, which is usually the cause of the cough; if they are eaten freely at the outset of a cold, they will break up what promised, from the severity of the attack, to have been a serious one.

2. That milk which is turned or changed may be sweetened and rendered fit for use again by stirring in a little soda.

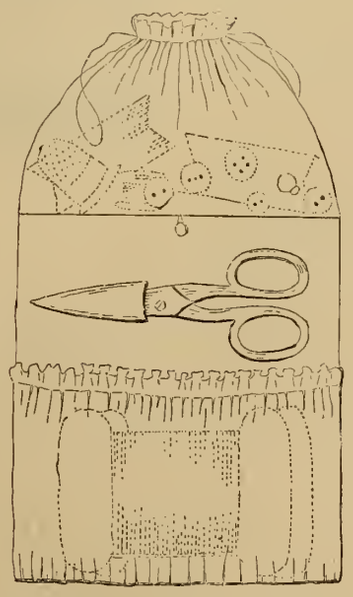
3 That salt will curdle new milk; hence, in preparing milk porridge, gravies, etc., the salt should not be added until the dish is prepared.

4. That fresh meat, after beginning to sour, will sweeten if placed out of doors in the cool of night.

5. That kerosene will soften boots and shoes that have been hardened by water, and render them as pliable as new.

A Neat Work Bag.

THE device shown in our illustration will be found most convenient for a short journey, or to have hanging beside a dressing-table. The dotted lines indicate the articles it is to be filled with; of



course, others may be added as desired. The case is made of tan-colored grossgrained ribbon four inches in width. It requires about five-eighths of a yard for one, and it should be seven inches long when finished. For the foundation cut a strip off seven inches long. For the bottom pocket, which is to hold the darning cottons, you will need a width and a quarter of the ribbon three inches deep. Turn the top down and shir it across, allowing it to be a little looser than the back; gather the bottom on the back, sew it in a seam and turn it up and overhand the sides together. The bag on the top requires but one width three inches deep; sew it in a seam across the bottom, turn it up, overhand the sides together; hem the top and run a shir in it for the silk cord, which is to draw it up. The silk and cotton in this are wound on little pieces of card-board, so as to be less bulky than spools. A piece of card board is cut to fit in the space between the bags; this is covered on both sides with the ribbon; a few leaves of flannel are attached to it, and it is fastened to the foundation by a few stitches of silk at each corner and middle of the bottom. A little piece of the ribbon is hemmed on the outside to hold the scissors. It is held together with a loop and a button.

Don'ts for the Sickroom.

DON'T light a sickroom at night by means of a jet of gas burning low; nothing impoverishes the air sooner. Use sperm candles or tapers which burn in sperm oil.

Don't allow offensive matters to remain. In cases of emergency where these cannot be at once removed, wring a heavy cloth, for instance, like Turkish towelling, out of cold water, use it as a cover, placing over this ordinary paper. Such means prevent the escape of odor or infection.

Don't forget to have a few beans of coffee handy, for this serves as a deodorizer if burnt on coals or paper. Bits of charcoal placed around are useful in absorbing gases and other impurities.

Don't have the temperature of a sickroom much over 60°; 70° are allowable, but not advisable.

Don't permit currents of air to blow upon the patient. An open fireplace is an excellent means of ventilation. The current may be tested by burning a piece of paper in front.

Don't give the patient a full glass of water to drink from, unless he is allowed all he desires. If he can drain the glass he will be satisfied, so regulate the quantity before handing it to him.

Don't neglect during the day to attend to necessaries for the night, that the rest of the patient and the family may not be disturbed.

Don't ask a convalescent if he would like this or that to eat or drink, but prepare the delicacies, and present them in a tempting way.

Don't throw coal upon the fire; place it in brown paper bags, and lay them on the fire, thus avoiding the noise, which is shocking to the sick and sensitive.

Don't jar the bed by leaning or sitting upon it. This is unpleasant to one ill and nervous.

Don't let stale flowers remain in a sick chamber.

Don't be unmindful of yourself if you are in the responsible position of nurse. To do faithful work you must have proper food and stated hours of rest.

Don't appear anxious, however great your anxiety.

Don't forget that kindness and tenderness are needful to successful nursing. Human nature longs to be soothed and comforted on all occasions when it is out of tune.—*Medical Classics.*

Helpful Household Hints.

DIP fish into boiling water and the scales will come off easier.

STUDY to make the warmed-over dishes decidedly more than ordiuary hashes.

To prevent the smell of paint put a handful of hay in a bucket of water, and let it stand in the room over night.

KEROSENE is useful in cleaning zinc after it has been washed in soap suds.

A LITTLE saltpetre or carbonate of soda mixed with the water in which flowers are placed will keep them fresh for two weeks.

DRY buckwheat flour repeatedly applied will remove obstinate grease spots from carpets, woollens or silk.

SOME housekeepers think that the virtue of cloves as moth preventive is not fully appreciated.

THREE parts of resins, one part of caustic soda and five parts of water make a good cement for glass and china.

BE sure to empty your tin fruit or vegetable can when you open it. Do not leave any of the contents in the can, if you propose to use them. Put them in an earthen dish. They are very likely to become unwholesome if left in the can after it is opened.

The Prize Essays.

As promised, we publish in this number the two essays on "Why I Like Life in the Country," which are entitled to honorable mention. They are as follows ·

THERE are a great many reasons why I like to live in the country. I will commence with spring, and give my reasons with the seasons. In the spring, when warm weather commences, there is a great deal of fun to be had by making maple sugar and having sugar parties. Surely all people at a sugar party enjoy themselves very much. Then in a short time the warm, sunny days of the latter part of April and the first of May come with their beautiful, many-colored flowers and fresh green grass and trees just putting on their summer dress of green leaves. How very beautiful a fresh, green landscape, dotted with great forest and fruit trees and bushes in full bloom, looks! I am sure that there is no natural thing in towns or cities that looks so extremely grand as that; and you cannot get any such pure flower-perfumed air in any place but the country. Now is the time that the grain is sown. It is scattered over the ground and covered with warm, moist soil, and soon the fields are covered with green, and in a not very much longer time, with golden grain. Do not the fields covered with golden grain, and the busy reapers cutting it, make a very grand picture? Soon after the grain is cut and put in the barns, the apples and nuts are ripe. The fun we have gathering apples and nuts in the beautiful Indian summer sunshine is not equalled in any place but the country. Sometimes there are corn-husking bees made, and everybody in the neighborhood is invited, and nearly everybody comes. They husk corn till all are hungry, and then have supper on pumpkin pies, cakes and everything else that is good. After supper there is generally a dance, and all must dance and enjoy themselves whether they want to or not. Now in a very short space of time winter is with us again. All the pieces of water, large and small, are frozen, and we get out our skates, sharpen and polish them, and go to the nearest pond, river or bay. Of course the weather is bitterly cold sometimes, but we cover our ears and hands and tell Jack Frost to do his worst. Then the sleigh rides that we can have whenever we like, almost come up to skating for sport. Now we can keep skating and sleigh-riding till spring comes again and takes all the snow and ice away. I like to live in the country because I can enjoy all these things at their very best and the fullest measure of them; but what I prize more than all these pleasures, is the perfect health which results from pure breathing air, and from a life which is almost entirely free from temptations that would lead me into habits that would ruin my health. Do you not think I have good sound reasons for liking life in the country?

MALCOLM OUTWATER,
Adolphustown, Ont.

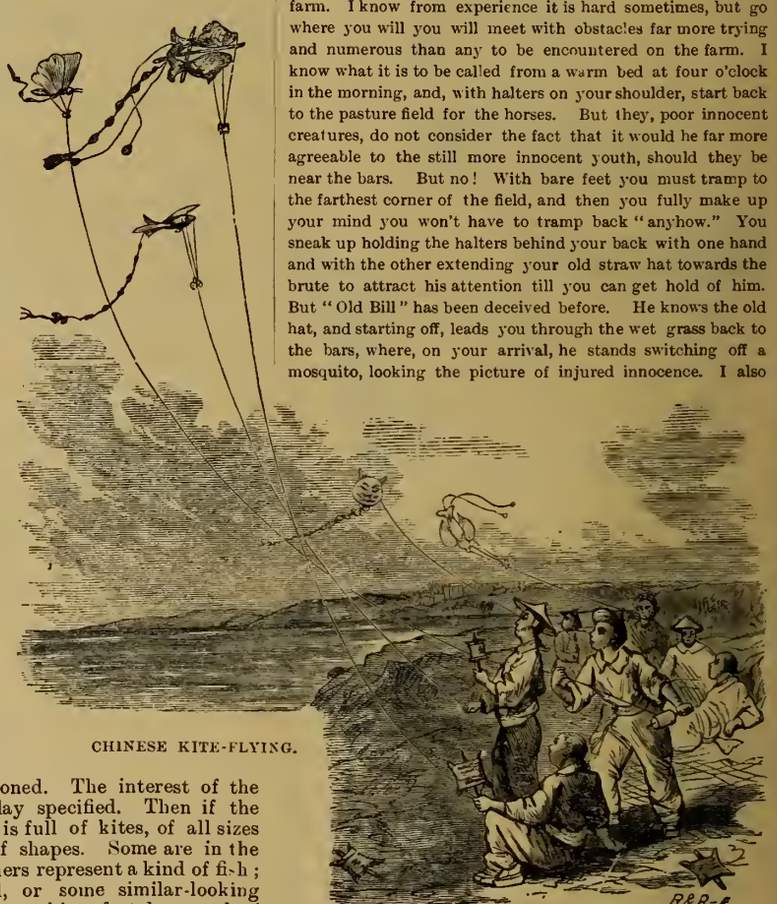
IN beginning my essay, I must say that for no other reason than viewing the beautiful town of Oakville, with its splendid harbor, its pleasant country surrounding, and everything so bright and cheerful connected with it, one is ready to admit country life is indeed enjoyable. The country has much variety of scenery, consisting of hill and dale, winding rivers with mountains on either side, broad maples and oaks, which spread their fine foliage in order to afford a shade on a hot and sultry summer day. Here the grass is long and thickly grown, and with the many trees looks like one mass of greenness. There are many delightful sports in the country. I enjoy those connected with the water most of all. Our lake is almost always dotted over in summer with sail boats, steam yachts and small boats which skim the water like birds. Fishing is much made a pleasure of, and although the fish are small in quantity, their quality of sweetness is not often found. Games of all kinds are a source of delight, such as ball, croquet and lawn-tennis, and much ground in the country is found to enlarge upon. I like the country for the many picnics we have in its woods. These woods are attached to every farm, and are often a long distance away. They are the spontaneous production of nature, and beautiful wild flowers grow among the shrubs. These flowers and ferns are of many classes and orders, and are of much use for botanical purposes, but they make pretty wreaths, being of such lovely tints and various shapes. I also like the country for the birds of brilliant plumage which inhabit it. We have the golden-yellow oriole, the bright robin red-breast, the cunning blue-bird and many others. But lovelier than all these birds are the ones that have sweet melodious voices. Early in the morning, when all is calm and peaceful, we hear their notes of praise. Lastly, I like the country on account of the sociability of the people, which makes it pleasant for strangers and the residents around. The people are mostly all in favor of temperance, which is a happy thing for any place, and above all they are sincerely religious, not being taken up with the vanities of this world, and not forgetting Him to whom they are indebted for their beautiful country.

SARA PATTERSON,
Oakville, Ont.

Chinese Kite-Flying.

THE following interesting account of the Chinese Kite-Flying festival is taken from a book written by Rev. Justus Doolittle, who was for fourteen years a member of the Fuhchau mission of the American Board.

The holiday of kite-flying on the highest hills in the city and suburbs is observed regularly on the ninth day of the ninth month at this place. Perhaps the inquisitive reader may be curious enough to enquire why the Chinese select that day for kite-flying in preference to any other day, or why they select any particular day at all? The Chinese explain that in ancient times a certain man was informed, by one who pretended to know the future, that on a specified day some calamity would befall his house or his property; so he took all his family on the morning of that day and went to the hills, spending the time the best he could. On returning home at nightfall he found his domestic animals all dead. That day was the ninth of the month. They also say that in imitation of his example they go to the hills on the ninth of the month and thus avoid any domestic calamity which might have befallen them at home; and to while away the time pleasantly they take along their kites and fly them. This is called "ascending on high," and indicates the flying of kites on the partiular day mentioned. The interest of the sport centres on the day specified. Then if the weather is fine, the air is full of kites, of all sizes and of a large variety of shapes. Some are in the shape of spectacles; others represent a kind of fish; others are like an eel, or some similar-looking animal, being from ten to thirty feet long and of proportionate size; others are like various kinds of birds, or bugs, or butterflies, or quadrupeds. Some resemble men sailing through the air; others are eight-sided, in imitation of the eight diagrams, invented by one of the earliest Chinese emperors. Most or all of those which represent animals are gaudily painted. The most common and simple ones are usually adorned with the head of the tiger or the dragon, or some idol, or some felicitous character, painted in bright colors. A foreigu resident or transient visitor passing along in the street about this period often sees, at a distance in the air, what seems to be an immense bird, and he is filled with surprise and joy at having so near a view of the unusual phenomenon, until he is reminded, by its nearly stationary position and mechanical movements, that it is nothing but a paper kite. At other times he notices a group of large hawks, apparently hovering around a common centre, and finally remembers of having heard of the skill of the Chinese in elevating five or more paper hawks into the air, and of controlling them by one strong cord, to which each are attached by short and separate lines. And again, he will behold with admiration, half a mile distant, an immense kite, consisting as a whole, of a large number of smaller ones, made to resemble the different blocks which constitute the game called "dominoes;" from the two ends of each block extend a reed or rush four or five feet long. This presents a singularly pretty appearance. Every year there is an especial proclamation issued by a city officer with reference to this kite-flying, warning against tumult on the ninth day of the ninth month on the Black Rock Hill. A petty mandarin, with a large staff of policemen or constables, is annually stationed on the hill, on the arrival of the day, for the purpose of keeping the peace and quelling the disturbance, should any arise. Probably thirty or forty thousand people visit that hill to fly their kites, especially if the weather is fine on that day.



CHINESE KITE-FLYING.

Advice to Boys on the Farm.

BY HARRY BULMER, WHITEWOOD, N.W.T.

Boys, take the advice of one who knows and stick to the farm. I know from experience it is hard sometimes, but go where you will you will meet with obstacles far more trying and numerous than any to be encountered on the farm. I know what it is to be called from a warm bed at four o'clock in the morning, and, with halters on your shoulder, start back to the pasture field for the horses. But they, poor innocent creatures, do not consider the fact that it would be far more agreeable to the still more innocent youth, should they be near the bars. But no! With bare feet you must tramp to the farthest corner of the field, and then you fully make up your mind you won't have to tramp back "anyhow." You sneak up holding the halters behind your back with one hand and with the other extending your old straw hat towards the brute to attract his attention till you can get hold of him. But "Old Bill" has been deceived before. He knows the old hat, and starting off, leads you through the wet grass back to the bars, where, on your arrival, he stands switching off a mosquito, looking the picture of injured innocence. I also know what it is to be running through a field trying to "head off" a runaway cow and get the stalk of a large Canadian thistle hetween your first and second toes, and with the next step strip it from bottom to top, leaving between said toes a bouquet of beautiful green thistles. Many times have I stubbed my toe and had stone-bruises. I've had a young calf ram its head into the bottom of a pail with sufficient force to almost dislocate my arm, while, with my fingers in its mouth, I was teaching it the art of drinking. But all the little troubles are nothing compared with the uncertainties to be contended with off the farm. Boys, stay with the farm and it will stay with you.

The Boys.

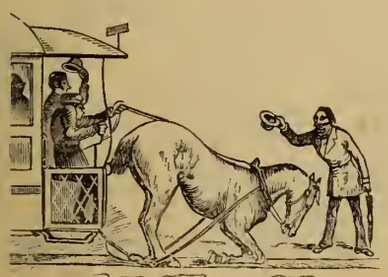
What would we do without the boys,
Without their rollicking, rumbling noise?
Without their whoops and their whistles shrill?
I tell you the place would be too still!
It wouldn't be home if we couldn't hear
The drummings and thrummings that split the ear.
Tho' they tie tin cans to the poor cat's tail,
And beat a tattoo on every old pail,
Tho' they're never two seconds at a time at rest,
Tho' we vote them a bore, a nuisance, a pest,
Yet we know in our souls life would lose its joys
If anything happened the noisy boys.

—*Susie M. Best.*

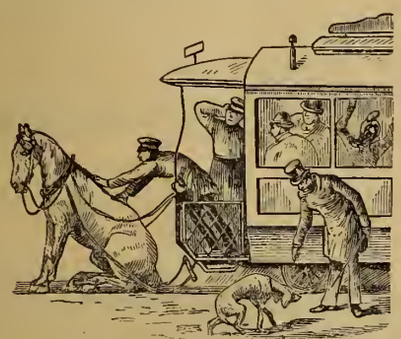
The Amiable Adventures of a Circus Horse

1.—The agent of the Toronto Street Railway Co. visits a circus (on business) and is induced to purchase this fine beast.

2.—Having stumbled and fallen on the first trip, the driver finds it diffioult to start the horse, which has been taught to "lie dead" while whips are cracked.



3.—A friend of a front-platform passenger bows politely—with this result upon the well trained steed.



4.—Hearing a bystander cry, "Down, Sir!" to his dog, the horse instantly obeys.

5.—And at the word of command from a small boy, takes this position. (N.B.—We learn that the circus has bought back the horse at half price.)

May in the Country.

I.

Rural trees are full of buds,
And along the road the mud's
Pretty deep;
The canal mule, sad and pale,
'Neath the pounding of the flail
Falls asleep.

II.

All the hens are on the lay,
And it feels like merry May,
Tootle toot;
And we trust the blue above
Is the sure conclusion of
Epizoot.

III.

Now the birdlet from the South
Has a gold straw in his mouth
As he flies;
And the Walker says he's found
Some arbutus on the ground
But he lies.

—*Puck.*

The path of duty—Through the custom-house.

What was the longest day in Adam's life? The day on which there was no eve.

An appropriate motto for a butting goat: "And this is the head and front of my off ending."

The girl with a six-foot sweetheart said she wouldn't tell a story, but she couldn't help but "draw a long beau."

A man with a new idea cannot be too careful of it. It may get away from him and become original with some one else.

If men all remembered everything that women tell them nothing in this world could ever by any possibility go wrong.

"Reform," says a writer, "should always go forward." A wise observation. The reform that sought to do away with the bustle went behind, and it failed.

It is mighty mean for anybody to assert that the reason an old maid pretends to faint when a misguided man tries to kiss her is to give him a chance to kiss her again.

A Born Grumbler.—"I am the unluckiest man living. Here I find a piece of money, and it is only a nickel. If any one else had found it, it would have been a quarter."

"Why would a barber rather shave three Irishmen than one German?" "You give it up? Of course you do. Well, because he'd get thirty cents from the three Irishmen and only ten cents from the German."

Johnny Dumpsey—"Say, Willie, didn't you ever think you'd like to be a pirate when you grew up?" Willie Popinjay (contemptuously)—"No! Pirates is played out. I want to be a member of some big trust, or a boodle alderman, or something of that sort."

A young married lady who moved into the country from a city home, considered keeping hens a pleasant and profitable duty. One day a friend enquired: "Are your hens good hens?" "Oh, yes," she replied in a delighted tone, "*they haven't laid a bad egg yet.*"

He was a farmer's boy and very little. His father was pulling off his stockings one evening preparatory to going to bed, when his mother asked, "Freddy, what is father doing?" Freddy had witnessed the process of treating ripened corn and replied: "He's huskin' his feet."

"You would be sorry to lose your sister, wouldn't you, Jimmy?" asked the visitor suggestively to the little boy who was entertaining him in the parlor. "Nope," replied Jimmy. "I guess I could stand it, Mr. Hankinson; maw says I've got to wear short pants till after she's married."

Clerk (to young lady who has purchased a pair of gold sleeve buttons for her betrothed)—"Any initials, Miss?" Young lady—"Oh, yes, I forgot; engrave the letter U, his first name." Clerk—"Ah, may I ask, miss, is it Uriah or Ulysses? names with U are very rare." Young lady (proudly)—"His name is Eugene."

Some railroad man has given to the world what he knows about a sleeper in the following: "A sleeper is one who sleeps. A sleeper is that in which the sleeper sleeps. A sleeper is that on which the sleeper runs while the sleeper sleeps. Therefore, while the sleeper sleeps in the sleeper the sleeper carries the sleeper over the sleeper under the sleeper until the sleeper which carries the sleeper jumps the sleeper and wakes the sleeper in the sleeper by striking the sleeper under the sleeper, on the sleeper, and there is no longer any sleeper sleeping in the sleeper on the sleeper."

CONDUCTED BY R. HARMER.

SOUTH AUSTRALIA:—Latest reports say that the wheat crop is good in quality and cleaner than usual, but will not exceed previous estimates.

BUENOS AYRES:—Latest advices states that another month of rain and floods has effectually prevented the shipment of wheat. Such a disastrously wet harvest has never been known in the River Platte since it became an exporting country, and reports of the total loss of the wheat crop have been received from several districts.

NEW ZEALAND:—Reports state that on Feb. 1 farmers were confidently counting upon from 40 to 50 bushels wheat to the acre, whilst there were many fields which looked as if they would thrash out from 70 to 80 bushels, if all should go well for the next three weeks. There were, indeed, many acres of light land which would not yield more than from 20 to 25 bushels, but taken all round the crop promised well.

THE harvest of 1888-9 will be long remembered with feelings of pleasure by the farmers of Canterbury. There has been not only a sufficiency of moisture to bring the cereal crops to maturity, but a continuous run of fine weather for their harvesting—nor'-westers have been experienced it is true, but the damage is infinitesimal. With the above satisfactory condition of things, the general average yield will be well up to that of past favorable seasons, and in addition to this the prices are likely to be satisfactory.

A REPRESENTATIVE travelling in the North Island writes us:—Wanganui settlers generally are jubilant at the success of the crops; indeed, all along the coast from Manawatu to Opunake the harvest promises to pan out well. As high as 88 bushels of wheat on the Waimate Plains has been mentioned. Mr. John Handley, of Okelua, has a splendid crop, considering that he did not sow till November, while one settler, Mr. Overman, of Kai Tou, who believes that he was the only one in the country to sow as late as the first week in December, iuformed the writer that he has a capital crop which he intended cutting during the first week in March. Another settler, who has a large crop of oats, states that he has been offered and refused 2s 3d per bushel, delivered in Waganui.

SOUTH AFRICA:—The following telegram has been received: "Will you please inform the Massey Manufacturing Co. that the Silver Medal was awarded their Toronto Binder at our Annual Agricultural Show, and will be forwarded them at once."

THE imports required by France this season were estimated last September at 8,000,000 qrs. In the first seven months about 8,600,000 qrs. had been disposed of for consumption, aud towards future requirements there were, on March 1, about 1,400,000 qrs. in bond, leaving thus about 3,000,000 qrs. to be imported between March 1 and August 1 to make up the quantity of 8,000,000 qrs., if that, after all, should prove to be the exteut of the requirements of France.

THE statistics of some past years show that about one-third of the wheat grown in Russia is winter, and that the country around Taganrog is essentially a winter wheat district. Cable advices this week say that the damage done by unusually severe weather last winter was about 40 per cent. presumably to the winter wheat alone. The Ghirka wheat is a spring sown variety, but the fact of its being the one most known in the English markets does not prove it to be cultivated to the exclusion of the other.

A Summary of News for the Past Month.

1st.—Death of Hon. John Henry Pope, Minister of Railways, at Ottawa, aged 69.

2nd.—Emin Bey Relief Committee receive a long and graphic letter from Henry M. Stanley, the intrepid African explorer, dated August 28th, describing the awful miseries through which he and his men passed on their way to rescue Emin Pasha. . . . Great loss sustained in South Dakota and Minnesota by prairie fires, one whole town being entirely destroyed; several people fatally burned.

3rd.—Advices received that King John of Abyssinia was defeated and slain in a recent battle, and that the whole country is in a state of anarchy.

4th.—The Scott Act defeated in the cities of St. Thomas and Guelph, and counties of Lincoln, Peterborough, Frontenac, Ontario, Northumberland and Durham, Carleton, Lanark, Brant, Lennox and Addington, Kent, Victoria, Wellington, Ont., and Colchester, N.S.

6th.—Death of the Duchess of Cambridge, aunt of the Queen, aged 82. . . . Destructive fire in Savannah, Ga.; loss over a million and a half dollars. . . . Cannington's tannery, Kingston, Ont., burned; loss $35,000.

9th.—Bill providing for Local Government in Scotland defeated in the Imperial House of Commons. . . . Death of M. Chevreul, the distinguished chemist, in Paris, France, aged 103 years. . . . Dominion Dairymen's Association organized at Ottawa.

12th.—Trial of Gen. Boulanger, Count Dillon and M. Henri Rochefort begun by the French Senate in the absence of the accused. . . . Rumored that an attempt was made upon the life of the Czar and that he was wounded by an exploding shell.

13th.—English Court of Queen's Bench decides that women are not eligible to membership in the London County Council. . . . Traffic Manager Tuttle, of the C. P. R., accepts the Chairmanship of the Passenger Committee of the trunk lines, New York; salary $15,000.

15th.—John Albert Bright elected to succeed his father, the late John Bright, as member of Parliament for the Central Division of Birmingham. . . . The British Budget shows a surplus for the year of £2,586,000, the largest amount since 1873.

16th.—Mr. Hugessen, Gladstonian, elected to represent Rochester in the Imperial House of Commons. . . . Census of the city of Winnipeg shows a population of 25,000.

17th.—Prorogation of the Nova Scotia Local Legislature after nine weeks' session. . . . Destructive forest fires in Patrick County, Virginia; over fifty farmers burned out.

18th.—The Town Council of Edinburgh, Scotland, decide by a majority vote to confer the freedom of the city upon Mr. Parnell. . . . Immense conflagration in New York, several men injured and some lives lost; loss to property over $2,000,000.

20th.—News received that the passengers and crew of the abandoned steamer Danmark, from Christiansand to New York, were rescued by the steamer Missouri.

21st.—Sir Julian Pauncefote, the newly appointed British Minister to Washington, arrives in New York.

22nd.—Resolutions of thanks to the thirteen members of Parliament who voted against the Jesuits' Estates Bill passed at a public meeting of the citizens of Toronto, and a memorial gold medal presented to Col. O'Brien, M.P. . . . Donald Morrison, the Lake Megantic murderer, captured after an interchange of shots, during which he was wounded. . . . Great rush of boomsters into the Oklahoma territory, which was formally opened for settlement to-day.

23rd.—Fire in Prescott, Ont., destroys property valued at $13,000; a lady perishes in the flames. . . . Extradition treaty, shutting the door in future against criminals from the United States, and the Anti-Combines Bill passed in the Dominion House of Commons.

24th.—Gen. Boulanger and party, having been expelled from Brussels, arrive in England. . . . Hon. Henry Starnes appointed President of the Quebec Legislative Council. . . . Lord Lonsdale arrives in San Francisco from his expedition to the Arctic region. . . . Hon. Mr. Chapleau tendered an enthusiastic reception by his Montreal friends on his return from France. . . . Premier Mowat refused the privilege of the floor by the New York Senate.

25th.—Boomsters leaving Oklahoma territory in disgust. . . . Big Protestant demonstration in Montreal to protest against the endorsement of the Jesuits' Estates Act by the Dominion Parliament. . . . The Scott Act defeated in Leeds and Grenville.

26th.—Wm. McLeod, a farmer at High Bluff, Man., murders his two children and then kills himself.

27th.—The Samoan Conference commences its sittings at Berlin, Germany.

28th.—Frightful railway accident near Hamilton, Ont.; over twenty passengers burned to ashes and several injured, through the limited express from Chicago leaving the track and the cars catching fire.

29th.—New York commences the joyous celebration of her centennial festivities. . . . Catholic congress at Madrid adopts a resolution demanding the restoration of the Pope's temporal power.

30th.—The Parnell Commission resumes its sittings in London, England, the first witness called to the stand being Mr. Parnell.

New Every Morning.

Every day is a fresh beginning,
Every morn is the world made new;
Ye who are weary of sorrow and suffering,
Here is a beautiful hope for you;
A hope for me and a hope for you.

All the past things are past and over,
The tasks are done and the tears are shed;
Yesterday's errors let yesterday cover;
Yesterday's wounds which smarted and bled
Are healed with the healing that night has shed.

Yesterday now is a part of forever,
Bound up in a sheaf which God holds tight,
With glad days, and sad days, and bad days, which never
Shall visit us more with their bloom and their blight,
Their fullness of sunshine or sorrowful night.

Let them go, since we cannot re-live them,
Cannot undo, and cannot atone;
God, in his mercy, receive, forgive them;
Only the new days are our own,
To-day is ours, and to-day alone.

Here are the skies, all burnished brightly,
Here is the spent earth, all re-born;
Here are the tired limbs, springing lightly
To face the sun and to share with the morn
In the chrism of dew and the cool of dawn.

Every day is a fresh beginning;
Listen, my soul, to the glad refrain,
And spite of old sorrow and older sinning,
And puzzles forecasted and possible pain,
Take heart with the day and begin again.

—*Susan Coolidge.*

How to be Healthy and Wealthy.

Don't worry.
"Seek peace and pursue it."
Be cheerful. "A light heart lives long."
"Work like a man, but don't be worked to death."
Never despair. "Lost hope is a fatal disease."
Spend less nervous energy each day than you make.
Don't hurry. "Too swift arrives as tardy as too slow."
Sleep and rest abundantly. Sleep is nature's benediction.
Avoid passion and excitement. A moment's anger may be fatal.
Associate with healthy people. Health is contagious as well as disease.
Don't overeat. Don't starve. "Let your moderation be known to all men."
Court the fresh air day and night. "Oh, if you knew what was in the air!"
Think only healthful thoughts. "As a man thinketh in his heart, so is he."

ENSILAGE CORN.

Giant, Prolific, GIANT P·SWEET·E CORN *Sweet.*

Our claim for the S. B. Co's **Giant Prolific Sweet Ensilage Corn** is, that it is especially valuable in having *less stalk* and *more leaf* than any other corn, one acre being worth eight acres of ordinary pasture. Where pasturage is expensive, it is the cheapest and best food that can be grown for feeding in a green state to stock of all kinds. It keeps them in good flesh, and is a great *milk producer*. Every farmer should provide a crop of Ensilage Corn for feeding to his stock when the pastures grow short.

PRICE.

1 lb. (post paid) - -	20c.	Per Bushel (bags free)	$1 75
Per Peck - - -	50c.	Two „ „ „ -	3 00

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Breeders' Directory.

Cards of not less than two line space and not more than six line space inserted for one year at $2.00 per line, less 25 per cent. discount, if paid quarterly in advance.

MOULTONDALE STOCK FARM.—Address F. J. RAMSEY, DUNNVILLE, ONT., Breeder and Importer of thoroughbred Suffolk and Berkshire Pigs, Shropshire and Leicester Sheep, Clydes and Shorthorns. Stock for Sale.

ANDREW GILMORE, OAK DALE FARM, HUNTINGDON, QUE., Importer and Breeder of Polled Angus Cattle, Oxford Down Sheep, and Yorkshire Pigs. Young Stock of the above for sale.

BEST YET. YOUR NAME on 25 cards, 20 Scrap Pictures and Prairie Whistle for 15c. TOM WRAY, Rodney, Ont.

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INCORPORATED A. D. 1855.

SUBSCRIBED CAPITAL, $4,500,000 | RESERVE FUND, - $ 1,320,000
PAID UP CAPITAL, - 2,500,000 | TOTAL ASSETS, - 10,586,000

Office: Company's Buildings, Toronto St., Toronto.

DEPOSITS received at current rates of interest, paid or compounded half-yearly.
DEBENTURES issued in Currency or Sterling, with interest coupons attached, payable in Canada or in England. Executors and Trustees are authorized by law to invest in the Debentures of this Company.
MONEY ADVANCED on Real Estate security at current rates and on favorable conditions as to re-payment.
Mortgages and Municipal Debentures purchased.

J. HERBERT MASON, Managing Director, Toronto.

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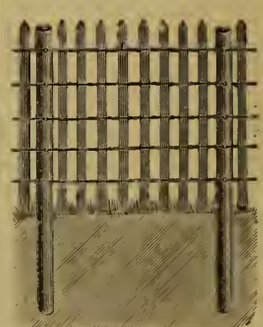

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4 Palmer House Block, Toronto.
or F. I. WHITNEY, Gen. Pass. & Ticket Agent, St. Paul.

The Dressmakers' MAGIC SCALE. The most perfect tailor system of cutting. Entire in one piece, with book of instructions.—*Will C Rood, Inventor.* Taught by Miss CHUBB, general agent for Ontario; also for the Universal Perfect Fitting Patterns. Send stamp for catalogue.
Agents wanted. 426½ Yonge St., Toronto.

SPRAY YOUR TREES.—We make the cheapest and best Spraying Pumps in the market. Send for Illustrated Circular.
RUMSEY & CO., Limited, Seneca Falls, N.Y.

A GOOD RULE.

Try to learn one new fact each day.

Try to digest it, understand it, and remember it for future use.

Let it be a fact about business, about astronomy, about politics, or about any live topic.

Soon you will know a great many valuable facts. Try it one week. Begin now.

Here is one for to-day :—

The oldest manufacturers of Harvesting Machinery in Canada are the Massey Manufacturing Co., of Toronto, Ont., their business having been established in 1847. The largest Canadian makers of Harvesting Machinery are the Massey Co. also, their output being 10,000 machines annually, and for 1889, from 13,000 to 14,000 machines—more than double the output of any other concern in the Dominion. Further, the Massey Co. build their machines from the ground up, including knives, cutter bars, knotters, wood pillars, malleable iron, bolts, nuts, rivets, etc., while other makers buy these things in whole or in part.

These facts are worth remembering, for they show which are the most popular machines in Canada as evidenced by the people's votes.

Engravings, Electrotypes, Pictures.

PUBLISHERS.—We offer for sale nearly all the Electrotypes of Engravings which have been used in MASSEY'S ILLUSTRATED AT VERY LOW FIGURES. Write for prices. Many of them are original, and scarcely any have ever before appeared in Canada.

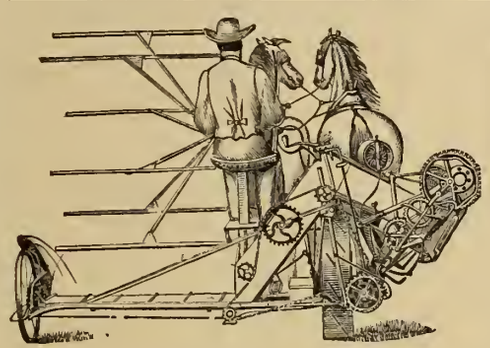
SILVER & GOLD.

The Toronto Light Binder has not only been meeting with remarkable success in the different countries of Europe—defeating all its chief competitors and winning some fine silver and gold medals—but its brilliant achievements in the harvest fields of Australasia, South America, and South Africa have drawn forth glowing eulogiums from the agriculturists of those far-distant lands. We are just in receipt of news from Cape Town, South Africa, that

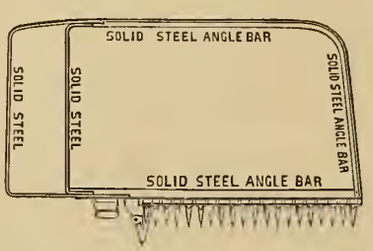
THE TORONTO BINDER HAS BEEN AWARDED THE SILVER MEDAL

for excellence, and testimonials as to its merit are continuously pouring in from all parts of the world.

As previously announced, **The Toronto Binder was awarded the Victorian Grand National Gold Medal**, and in the great Victorian field contests defeated every American, English, and Canadian machine of any note, winning **Eight** first prizes, and being in each case pronounced the best machine in every particular and to be one horse lighter in draft. In New Zealand, as well, it won the first prize at each of the two great Field Trials, all well-known machines competing.



TORONTO LIGHT BINDER.



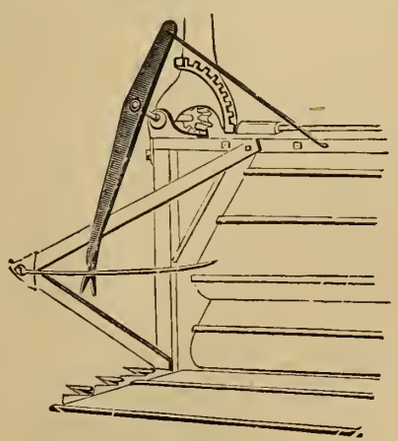
GROUND FLOOR PLAN OF THE TORONTO LIGHT BINDER

The simplest, stiffest, strongest, and best binder frame ever invented.

Steel and Malleable Iron

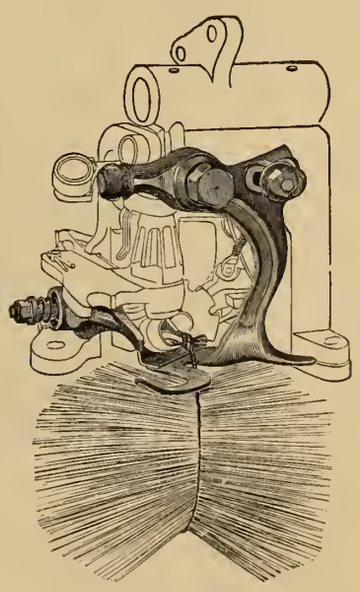
are the principal materials used in constructing the **Toronto**, which accounts for its **extreme lightness and great strength**. The Massey Manufacturing Co. use twice as much Steel and Malleable as used by other Canadian manufacturers.

The Toronto Relief Rake.



A NECESSITY TO PERFECT WORK.

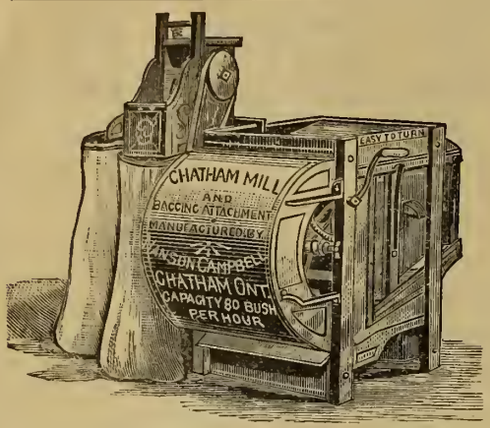
This is a light swaying fork that works back and forth over the knife-heel on the Toronto Light Binder and feeds into the elevator all the short grain, weeds and grass that gather at this point. Free and easy elevation is impossible without this well-adapted rake. It has an easy but certain motion, and effectually keeps this end of the platform free from obstructions, relieving the spot where all other harvesters give trouble. You will find it only on the Toronto Light Binder.



THE TORONTO KNOTTER.

THIS IS NOT a cheap knotter nor is it the simplest to be had. So-called simple knotters can be built for one-half the cost of the Toronto Knotter, which accounts for their use by certain makers. We own several patents on such knotters, but will not use them, as they cannot be adjusted to take up slack from wear (it being necessary to get new parts) nor can they be adjusted to successfully use any and all kinds of twine.

MASSEY-TORONTO.



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WILL CLEAN AND PUT IN BAGS
120 BUSHELS AN HOUR

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THE MOWER'S FRIEND.

ALL SOLID EMERY,

with Steel Rods inside.

Ask your Hardware Store for them, and

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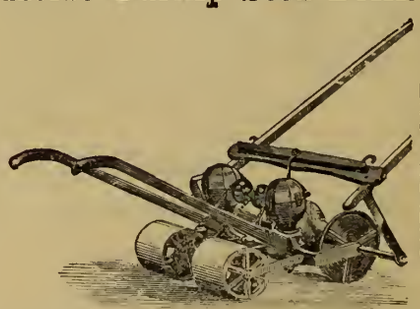
HAWKEY'S PATENTED IMPROVED STEEL SPRING ROAD CART.

This road-cart is unrivalled for neatness, strength, and comfort. It has an oil tempered four-leafed cast steel spring without shackles or joints. Wheel jar and horse motion are neutralized by a non-vibrating connection between the footboard and gear. It is made to carry one or two persons. Sold at the agencies of the Massey Manufacturing Co. Write for circulars to J. R. HAWKEY, Parkhill, Ont.

Horse Turnip Seed Drill.

THE GOWDY M'F'G CO.,



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With new improved Iron Canisters, sows two rows at once at any required depth, follows the course of the drills, and drops seed always in the centre, no waste of seed while turning. Sows Turnip, Carrot, Beet and Mangold-wurzel seeds.

We manufacture PLOWS of all kinds. Our TWO-FURROW GANGS and SULKY PLOWS are unsurpassed. Also Feed Cutters of all kinds, Reapers, Mowers, Fanning Mills, Scufflers, Land Rollers, Bag Trucks, Harrows, Scrapers. The "Champion" Four Horse Power. Agricultural Furnaces, Lawn Mowers, etc. ☞ Send for Catalogue.

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☞ It will pay farmers and others to read carefully the advertisements in this paper, and in writing to advertisers we would esteem it a favor if they would kindly mention MASSEY'S ILLUSTRATED.

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N.B—Clubbing List Subscriptions cannot under any circumstances count in competitions for Premiums or Prizes, but we will allow persons so subscribing to canvass and earn Premiums.

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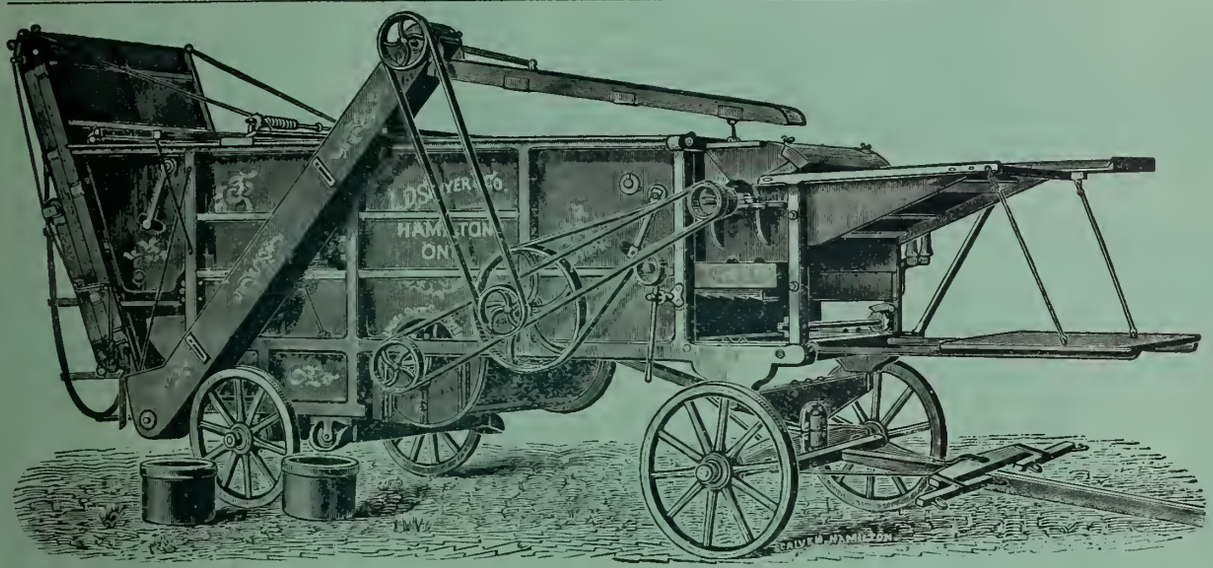

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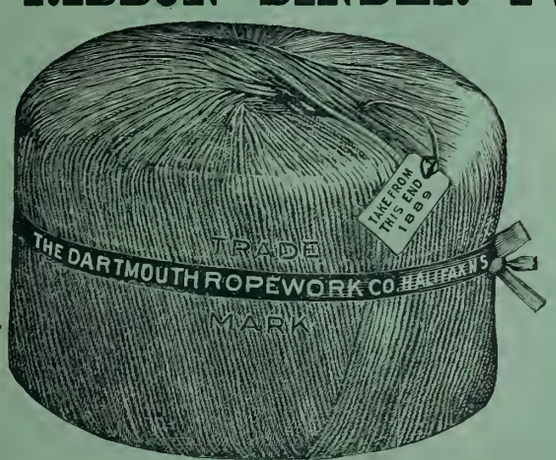

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Manufacture the Celebrated

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The only Twine that invariably gives satisfaction.

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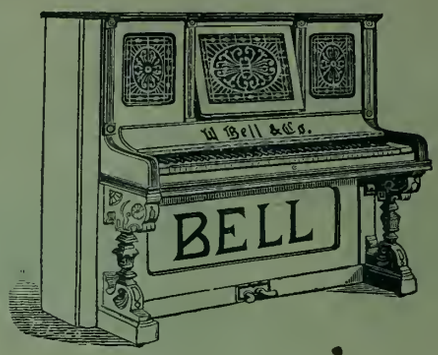

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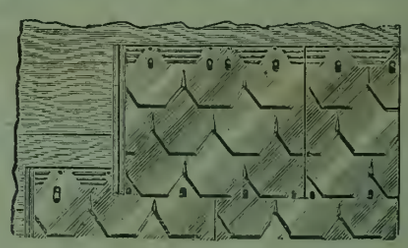

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